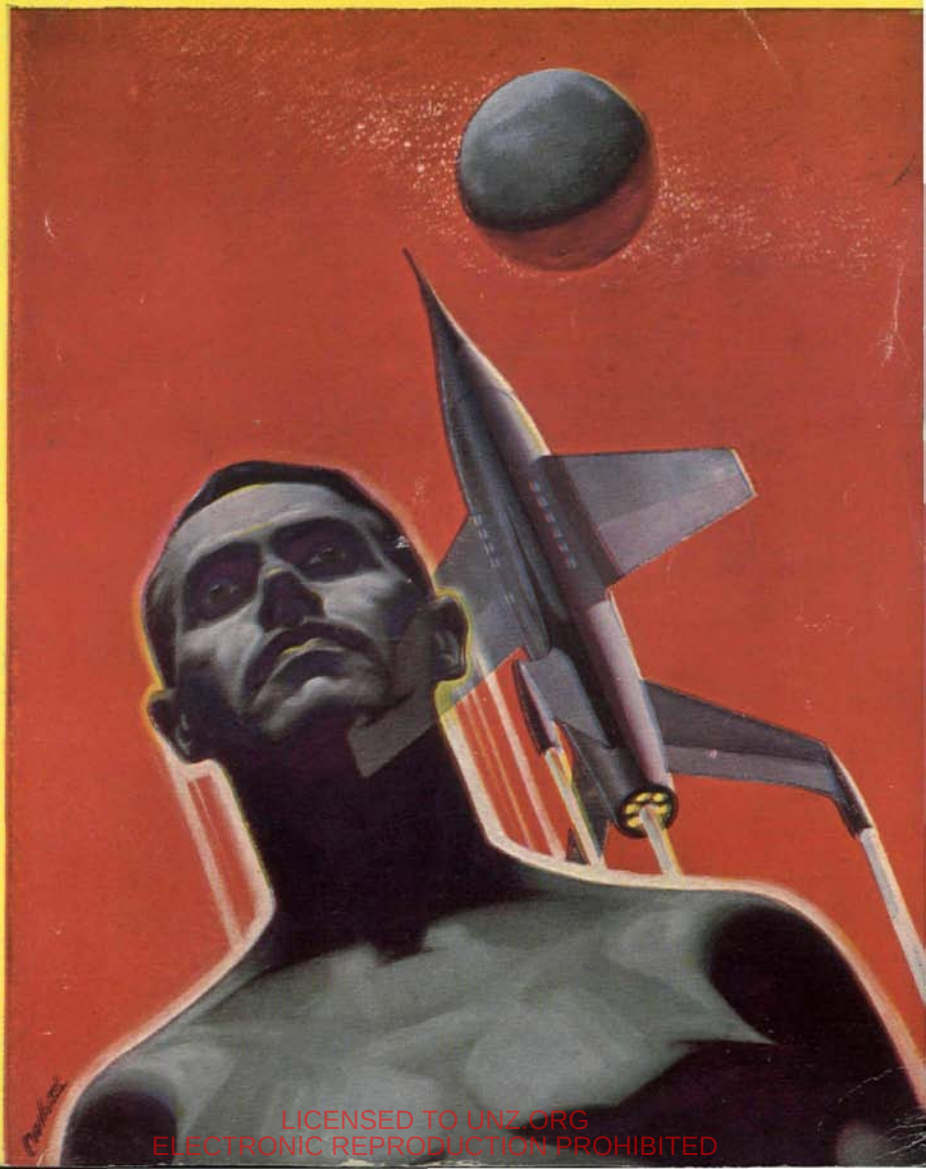
SPACE
SCIENCE FICTION

35c
SEPTEMBER 1953

IN THIS ISSUE • THE ESCAPE • BY POUL ANDERSON



LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Millions Speak ANOTHER LANGUAGE SO CAN YOU WITH LINGUAPHONE

World's Standard Conversational Method
The Quick, Natural, EASY Method

These are "astounding" facts:

YOU Bring a foreign land right into your own home with Linguaphone—
YOU Listen—to native voices—for 20 delightful, adventuresome minutes a day—
YOU Hear—Men and women converse in their native tongue about everyday matters.
YOU Learn to Speak—correctly as they do. The same easy natural way you learned English.
YOU Save—time, work, money.
YOU Gain—travel, business, armed services', cultural, educational advantages.
YOU—GO PLACES—

Stop Wishing! Start Talking!

FRENCH • SPANISH • GERMAN ITALIAN
RUSSIAN • JAPANESE • NORWEGIAN
any of 29 languages available

World-wide Education Endorsement

Used internationally by schools, colleges, governments, armed services, and business firms for personnel training. Over a million home-study students. Send for **Free Book TODAY.** Linguaphone Institute, 400 Madison Avenue, New York 13, N. Y.

WRITE FOR FREE BOOK

LINGUAPHONE INSTITUTE
400 MADISON AVENUE
New York 13, N. Y. SF-8

Send me your FREE book. I want to learn.....
language for ..... purpose.

Name.....

Address.....

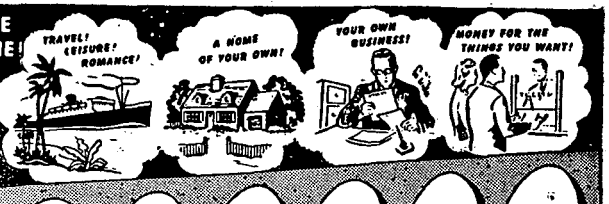
City.....Zone.....State.....

☐ Check here if Veteran.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

WIN A HUGE FORTUNE!

Make your dreams come true!



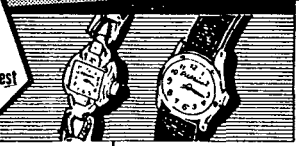
$100,000.00 IN CASH PRIZES

Send for FREE DETAILS & PUZZLES Mail Coupon Today

PLUS— a splendid CRÉSSINE WATCH

for everyone who Completes the Contest

Whether Solutions Are Correct or Not



TODAY! here on this very page! is an amazing contest opportunity that combines fascinating puzzle-solving enjoyment with fabulous cash prizes . . . *PLUS a guaranteed reward for EVERYBODY who completes the contest*

Yes, winning in this contest may make your dreams come true . . . may help you realize your fondest hopes and ambitions! This is a contest in which you may win *thousands of dollars* and where EVERYONE who completes the contest gets a fine CRÉSSINE Watch—*as part of a vast program to familiarize the American public with this superb line of timepieces.*

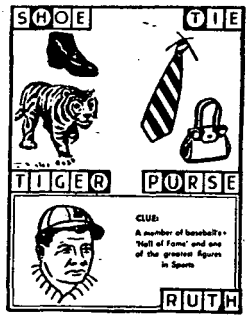
See Sample Puzzle at Upper Right!

This contest consists of puzzles like the SAMPLE PUZZLE at right. Note how we filled it in . . . how we identified the objects and found that certain letters in the names of the objects stood out from the rest, thus to spell out the name of the famous person pictured at the bottom. Read the explanation carefully

Note how we identified each object with a word of as many letters as there are boxes in diagram accompanying it. In upper left we filled in word SHOE; in upper right, TIE. In lower left, TIGER; in lower right, PURSE. Note that some of the letters fell into boxes with a little circular frame inside. Those "circled" letters, arranged into proper order, spell out the famous name we are looking for.

Here, for example, the "circled" letters are H T R U So we run through the names printed under the puzzle and discover Babe RUTH, whose last name is the correct solution, and whose picture you see at bottom

SAMPLE PUZZLE



Solution is One of the Names Below:

Zane GREY — Henry CLAY
Aaron BURR — Babe RUTH

500 Cash Prizes!

1st Prize	$50,000.00
2nd Prize	$10,000.00
3rd Prize	$7,500.00
4th Prize	$5,000.00
5th Prize	$2,500.00
6th Prize	$2,000.00

and 494 Additional Awards!

Plus a CRÉSSINE Watch for Everyone Finishing Contest

Act Now—Win A Fortune

Right now! Take the first step toward winning! Act to take advantage of this opportunity to bring wealth and abundance into your life, and into the lives of those dear to you. Write or mail the coupon (at right), and we will send you—WITHOUT COST OR OBLIGATION—puzzles and full details explaining what you have to do to WIN.

For details; send now; send with your name and address, or mail coupon to

FAMILY PUZZLE CONTEST
1-20-27 New York 10, N.Y.

FAMILY PUZZLE CONTEST

P. O. Box 195, New York 10, N. Y. 1-20-27

Mail me FREE PUZZLES and full particulars, including Entry Form and Official Rules of the FAMILY PUZZLE CONTEST in which a First Prize of $50,000.00, Second Prize of $10,000.00 and Third Prize of $7,500.00 will be awarded as part of 500 cash prizes totaling $100,000.00.

NAME (Please Print) ☐ Mr. ☐ Mrs. ☐ Miss _____

ADDRESS _____

CITY _____ STATE _____ (Zone)

Do Not Detach

NOTE: Fill in below name and address of FRIEND or RELATIVE you wish contest details sent to!

Do Not Detach

NAME ☐ Mr. ☐ Mrs. ☐ Miss _____

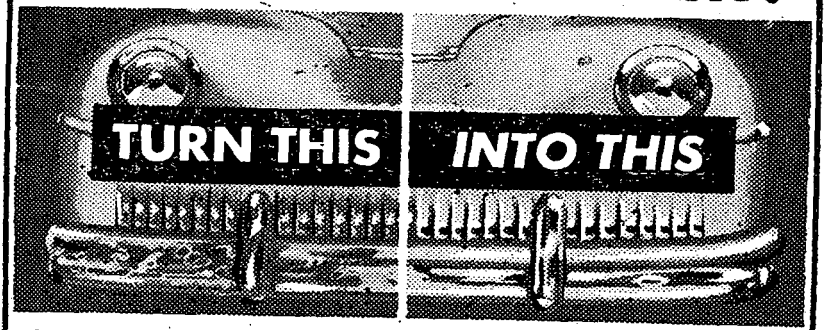
ADDRESS _____

CITY _____ STATE _____

Act Now! MAIL COUPON TODAY

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

AT LAST! A CHROME RESTORER THAT WORKS!



Amazing new 2-way chrome protector wipes away rust —pits—corrosion—in just 2 minutes! Stops rust from forming! Keeps chrome mirror-bright!

Now keep your bumpers, grillwork, window-frames, all chrome on your car sparkling bright as the day you bought it! Keep it rust-free for life! No matter how badly pitted or scarred, this sensational new 2-Way Chrome Protector wipes it Mirror-Bright, prevents new rust and corrosion from forming!

$2

ONE APPLICATION LASTS ENTIRE SEASON—gives you safe, fool-proof protection against vicious biting erosions of **SALT AIR—SUN—RAIN—SLEET—etc. 101 USES**—for fishing reels, boat trims, bicycles, sporting equipment, etc. Household appliances, farm equipment, toys, any chromed object, etc.

Complete Chrome Protector Kit contains:

1—**Bottle of RUST REMOVER chemical with special applicator. Enough to remove all rust from car.**

2—**Can of PROTECTOR chrome rust preventer and applicator. Enough for years of safe protection.**

RESULTS ABSOLUTELY GUARANTEED OR MONEY BACK!

Enclose $2, check or money order with name and address. C.O.D. orders plus postal charges. Get Your Chrome Kit Now!

H. SEARS INDUSTRIES, INC.. Dept. SF-8
400 MADISON AVE., N.Y. 17, N.Y.

H. SEARS INDUSTRIES, Inc. Dept. SF-8
80 Fifth Avenue, New York 11, N. Y.

Please send me ( ) CHROME KITS at $2.00 each. It is understood that you guarantee excellent results or I may return package within 10 days for a refund of my purchase price.

Name_____

Address_____

City_____ Zone____ State_____

( ) Send C.O.D. I will pay postman on delivery plus postage and handling charges. (You save approximately 57c by enclosing $2.00 in cash, check or money order.)

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

SPACE SCIENCE FICTION

SEPTEMBER, 1953 **Volume 2, Number 2**

FEATURE NOVEL

THE VARIABLE MAN, *by Philip K. Dick* 6

SERIAL

THE ESCAPE, *by Poul Anderson* 97

SHORT STORIES

THE HOUR OF BATTLE, *by Robert Sheckley* 74
DECISION, *by Frank M. Robinson* 81

DEPARTMENTS

EDITORIAL 4
SCIENCE—FACT AND FICTION, *by George O. Smith* 94

COVER BY CIVILETTI • ILLUSTRATIONS BY EBEL • KRENKEL • ORBAN • SMITH

SPACE SCIENCE FICTION is published bi-monthly by Space Publications, Inc., 80 Fifth Avenue, New York 11, N. Y. All stories in this issue are new and have not previously been published. No actual persons are designated in works of fiction, either by name or character; any similarity is coincidental. Copyright 1953 by Space Publications, Inc. All rights, including translation reserved. Entered as second-class matter at the Post Office, at New York, N. Y. Subscriptions $3.50 per 12 issues in the United States and Possessions; $4.50 per 12 issues in Canada; $5.00 elsewhere. Not responsible for unsolicited manuscripts or art work. All submissions must include return postage to expedite the return of manuscripts not acceptable.

JOHN RAYMOND • *Publisher*
BILL BRADLEY • *Circulation Mgr.*
DAVID GELLER • *Advertising Mgr.*
H. L. MITCHELL • West Coast Office

LESTER DEL REY • *Editor*
GEORGE O. SMITH • *Book Editor*
MILTON BERWIN • *Art Director*
JOHN VINCENT • *Assoc. Editor*

$3.50 per 12 issues in U. S. A. PRINTED IN U. S. A. 173 35¢ per copy

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

AN EDITORIAL ON

IDEAS vs. STORIES

Recently, a writer who was of the old school of science fiction started to tell us an idea for a story. Sitting beside him was another writer who began his work after the boom began. At the end, we sat staring off into space, enjoying the interplay of ideas in the plot. The young writer was also somewhat dazed. His comment came out with a kind of shocked disgust: "You're crazy. Why you could get fifty stories out of those ideas!"

And when we stopped to think of it, he would have gotten fifty stories—and probably have sold them. But he wouldn't have had a single story that was worth remembering.

Yep, we're mourning the good old days, in a way. We happen to like the kind of science-fiction writing that gets one main idea and then couples in something else, and adds ideas like a cat increasing the population. Most longer stories used to be like that; the writer usually had so many things in a story that he had to throw half of them away in the writing. There was a wild sort of excitement to it.

Now, of course, the writers have learned that all you need for a story is one twist. They're very clever. We've seen ideas that were only a single paragraph in the older stories brought out, dusted off, given a "literary" frame, and written up to five thousand or fifty thousand words.

And we still think the idea was better as just a minor but fascinating bit in a *real* story. We're somewhat sick of all the stories that come in with a nice economy of ideas covered up by words and more words that would look just as well in any other kind of fiction. We're still looking for the story that is done for the pure delight of seeing how much can be done to work out every possible angle and permutation, and where the writer isn't afraid that if he uses more than one idea in a story, he'll run out. Maybe we'll never print the story the old writer outlined, for one reason or another, but we had a heck of a good time just listening to the angles he considered incidental. We rarely get the same kick out of a finished story nowadays.

There are probably fifty magazines carrying science fiction on the stands today; and in any given month, perhaps there are fifteen first-

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

class stories! The words in the others may be even prettier than ever, but what on Earth or beyond it is going to keep the readers reading? The boom could be a fine thing, if it were really delivering the goods to the potential new readers; but if the net reaction is one of "ho-hum," this is going to resemble the classic real-estate booms of old, where everybody got frantically rich—and then broke—off nothing.

There are a few writers who can still deliver the goods. To our way of thinking, Poul Anderson is getting steadily better—which means richer with ideas for the sheer fun of having ideas; even some of his lesser work now has a feeling of gusto we've been missing too long. There are a number of others who also come through regularly. But they can't carry the whole field of science fiction alone. In the old days, Robert Heinlein wrote a story on *esp* under another name. In it, he covered every thing that he could crowd out of a fertile imagination on the subject. Today, we just read a story which was fifteen thousand words long and devoted to the single, bare question of what would happen if a telepath began to read his own unconscious. Nothing more—he finally went crazy. Aside from the fact that it was based on half-knowledge of very doubtful psychology, it was also just plain dull.

We've tried to avoid printing anything which didn't give us a kick in reading it. Sometimes, we have to confess, this has been tough going; sometimes we've done what every other editor has also done—taken what was simply the best that could be had, even though it should be better.

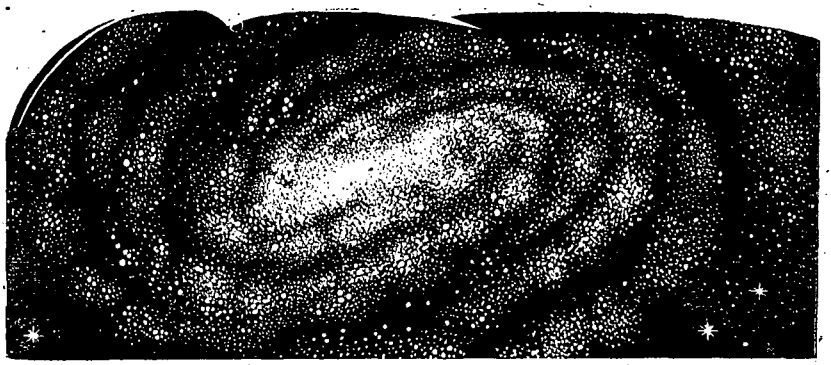
Now, though, we're declaring a small, minor war against the idea that plot gimmicks are so precious they have to be hoarded. And we'd like a little assistance from any readers who agree that science fiction needs kicking back into the hands of men who write for kicks as well as for bucks (though no writer is worth more than he thinks he is!).

If you find a story you consider dull, or if you remember one that we've printed—or anyone else has printed—sit down and write your gripes to us. Frankly, we want ammunition to prove we're not alone, and to knock over the heads of some darned fine guys and excellent writers who'd have more fun if they'd stop hoarding the source of that fun—something to tickle the think-tank.

And, incidentally, we're going to do our darndest to get that story the guy was telling us!

LESTER DEL REY

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

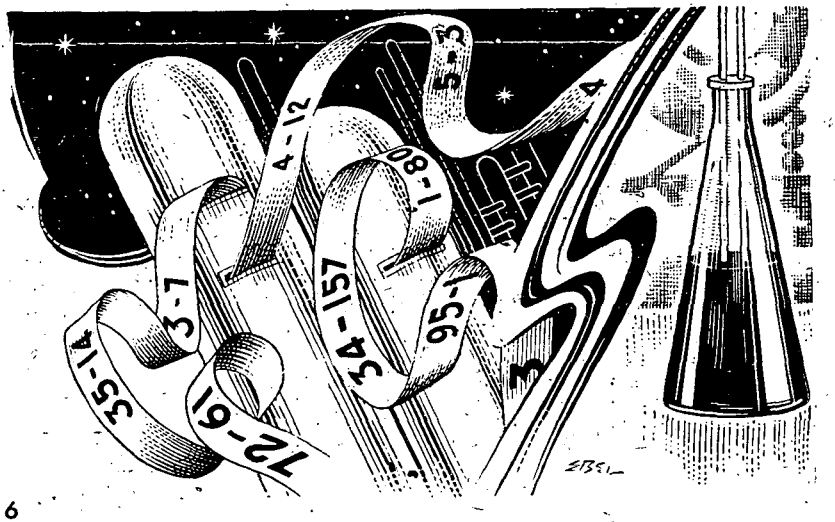


THE VARIABLE MAN

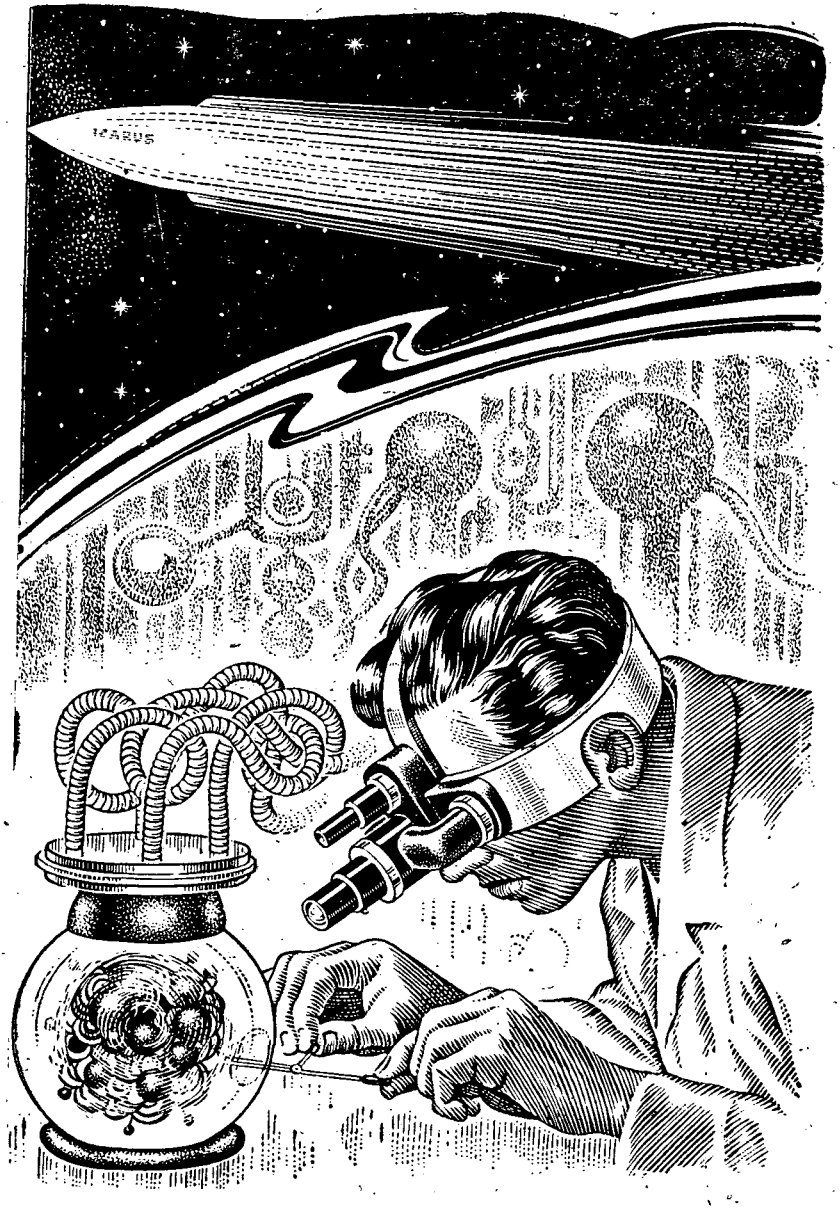
BY PHILIP K. DICK

ILLUSTRATED BY EBEL

He fixed things—clocks, refrigerators, vidsenders and destinies. But he had no business in the future, where the calculators could not handle him. He was Earth's only hope—and its sure failure!



LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED



LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Security Commissioner Reinhart rapidly climbed the front steps and entered the Council building. Council guards stepped quickly aside and he entered the familiar place of great whirring machines. His thin face rapt, eyes alight with emotion, Reinhart gazed intently up at the central SRB computer, studying its reading.

"Straight gain for the last quarter," observed Kaplan, the lab organizer. He grinned proudly, as if personally responsible. "Not bad, Commissioner."

"We're catching up to them," Reinhart retorted. "But too damn slowly. We must finally go over—and soon."

Kaplan was in a talkative mood. "We design new offensive weapons, they counter with improved defenses. And nothing is actually made! Continual improvement, but neither we nor Centaurus can stop designing long enough to stablize for production."

"It will end," Reinhart stated coldly, "as soon as Terra turns out a weapon for which Centaurus can build no defense."

"Every weapon has a defense. Design and discord. Immediate obsolescence. Nothing lasts long enough to—"

"What we count on is the *lag*," Reinhart broke in, annoyed. His hard gray eyes bored into the lab organizer and Kaplan slunk back. "The time lag between our offensive design and their counter development. The lag varies." He waved impatiently toward the massed banks of SRB machines. "As you well know."

At this moment, 9:30 AM, May 7, 2136, the statistical ratio on the SRB machines stood at 21 - 17 on the Centauran side of the ledger. All facts considered, the odds favored a successful repulsion by Proxima Centaurus of a Terran military attack. The ratio was based on the total information known to the SRB machines, on a gestalt of the vast flow of data that poured in endlessly from all sectors of the Sol and Centaurus systems.

21-17 on the Centauran side. But a month ago it had been 24 - 18 in the enemy's favor. Things were improving, slowly but steadily. Centaurus, older and less virile than Terra, was unable to match Terra's rate of technocratic advance. Terra was pulling ahead.

"If we went to war now," Reinhart said thoughtfully, "we would lose. We're not far enough along to risk an overt attack." A harsh, ruthless glow twisted across his handsome features, distorting them into a stern mask. "But the odds are moving in our favor. Our offensive de-

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

signs are gradually gaining on their defenses."

"Let's hope the war comes soon," Kaplan agreed. "We're all on edge. This damn waiting. . . ."

The war would come soon. Reinhart knew it intuitively. The air was full of tension, the *elan*. He left the SRB rooms and hurried down the corridor to his own elaborately guarded office in the Security wing. It wouldn't be long. He could practically feel the hot breath of destiny on his neck—for him a pleasant feeling. His thin lips set in a humorless smile, showing an even line of white teeth against his tanned skin. It made him feel good, all right. He'd been working at it a long time.

First contact, a hundred years earlier, had ignited instant conflict between Proxima Centauran outposts and exploring Terran raiders. Flash fights, sudden eruptions of fire and energy beams.

And then the long, dreary years of inaction between enemies where contact required years of travel, even at nearly the speed of light. The two systems were evenly matched. Screen against screen. Warship against power station. The Centauran Empire surrounded Terra, an iron ring that couldn't be broken, rusty and corroded as it was. Radical new weapons had to be conceived, if Terra was to break out.

Through the windows of his office, Reinhart could see endless buildings and streets, Terrans hurrying back and forth. Bright specks that were commute ships, little eggs that carried businessmen and white-collar workers around. The huge transport tubes that shot masses of workmen to factories and labor camps from their housing units. All these people, waiting to break out. Waiting for the day.

Reinhart snapped on his vidscreen, the confidential channel. "Give me Military Designs," he ordered sharply.

He sat tense, his wiry body taut, as the vidscreen warmed into life. Abruptly he was facing the hulking image of Peter Sherikov, director of the vast network of labs under the Ural Mountains.

Sherikov's great bearded features hardened as he recognized Reinhart. His bushy black eyebrows pulled up in a sullen line. "What do you want? You know I'm busy. We have too much work to do, as it is. Without being bothered by—politicians."

"I'm dropping over your way," Reinhart answered lazily. He adjusted the cuff of his immaculate gray cloak. "I want a full description of your work

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

and whatever progress you've made."

"You'll find a regular departmental report plate filed in the usual way, around your office someplace. If you'll refer to that you'll know exactly what we—"

"I'm not interested in that. I want to *see* what you're doing. And I expect you to be prepared to describe your work fully. I'll be there shortly. Half an hour."

Reinhart cut the circuit. Sherikov's heavy features dwindled and faded. Reinhart relaxed, letting his breath out. Too bad he had to work with Sherikov. He had never liked the man. The big Polish scientist was an individualist, refusing to integrate himself with society. Independent, atomistic in outlook. He held concepts of the individual as an end, diametrically contrary to the accepted organic state Weltansicht.

But Sherikov was the leading research scientist, in charge of the Military Designs Department. And on Designs the whole future of Terra depended. Victory over Centaurus—or more waiting, bottled up in the Sol System, surrounded by a rotting, hostile Empire, now sinking into ruin and decay, yet still strong.

Reinhart got quickly to his feet and left the office. He hurried down the hall and out of the Council building.

A few minutes later he was heading across the mid-morning sky in his highspeed cruiser, toward the Asiatic land-mass, the vast Ural mountain range. Toward the Military Designs labs.

Sherikov met him at the entrance. "Look here, Reinhart. Don't think you're going to order me around. I'm not going to—"

"Take it easy." Reinhart fell into step beside the bigger man. They passed through the check and into the auxiliary labs. "No immediate coercion will be exerted over you or your staff. You're free to continue your work as you see fit—for the present. Let's get this straight. My concern is to integrate your work with our total social needs. As long as your work is sufficiently productive—"

Reinhart stopped in his tracks.

"Pretty, isn't he?" Sherikov said ironically.

"What the hell is it?

"Icarus, we call him. Remember the Greek myth? The legend of Icarus. Icarus flew. . . . This Icarus is going to fly, one of these days." Sherikov shrugged. "You can examine him, if you want. I suppose this is what you came here to see."

Reinhart advanced slowly.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

"This is the weapon you've been working on?"

"How does he look?"

Rising up in the center of the chamber was a squat metal cylinder, a great ugly cone of dark gray. Technicians circled around it, wiring up the exposed relay banks. Reinhart caught a glimpse of endless tubes and filaments, a maze of wires and terminals and parts criss-crossing each other, layer on layer.

"What is it?" Reinhart perched on the edge of a workbench, leaning his big shoulders against the wall. "An idea of Jamison Hedge—the same man who developed our instantaneous interstellar vidcasts forty years ago. He was trying to find a method of faster than light travel when he was killed, destroyed along with most of his work. After that ftl research was abandoned. It looked as if there were no future in it."

"Wasn't it shown that nothing could travel faster than light?"

"The interstellar vidcasts do! No, Hedge developed a valid ftl drive. He managed to propel an object at fifty times the speed of light. But as the object gained speed, its length began to diminish and its mass increased. This was in line with familiar twentieth-century concepts of mass-energy transformation. We conjectured that as Hedge's object gained velocity it would continue to lose length and gain mass until its length became nil and its mass infinite. Nobody can imagine such an object."

"Go on."

"But what actually occurred is this. Hedge's object continued to lose length and gain mass until it reached the theoretical limit of velocity, the speed of light. At that point the object, still gaining speed, simply ceased to exist. Having no length, it ceased to occupy space. It disappeared. However, the object had not been *destroyed*. It continued on its way, gaining momentum each moment, moving in an arc across the galaxy, away from the Sol system. Hedge's object entered some other realm of being, beyond our powers of conception. The next phase of Hedge's experiment consisted in a search for some way to slow the ftl object down, back to a sub-ftl speed, hence back into our universe. This counterprinciple was eventually worked out."

"With what result?"

"The death of Hedge and destruction of most of his equipment. His experimental object, in re-entering the space-time universe, came into being in space already occupied by matter. Possessing an incredible

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

mass, just below infinity level, Hedge's object exploded in a titanic cataclysm. It was obvious that no space travel was possible with such a drive. Virtually all space contains *some* matter. To re-enter space would bring automatic destruction. Hedge had found his ftl drive and his counterprinciple, but no one before this has been able to put them to any use."

Reinhart walked over toward the great metal cylinder. Sherikov jumped down and followed him. "I don't get it," Reinhart said. "You said the principle is no good for space travel."

"That's right."

"What's this for, then? If the ship explodes as soon as it returns to our universe—"

"This is not a ship." Sherikov grinned slyly. "Icarus is the first practical application of Hedge's principles. Icarus is a bomb."

"So this is our weapon," Reinhart said. "A bomb. An immense bomb."

"A bomb, moving at a velocity greater than light. A bomb which will not exist in our universe. The Centaurans won't be able to detect or stop it. How could they? As soon as it passes the speed of light it will cease to exist—beyond all detection."

"But—"

"Icarus will be launched outside the lab, on the surface. He will align himself with Proxima Centaurus, gaining speed rapidly. By the time he reaches his destination he will be traveling at ftl-100. Icarus will be brought back to this universe within Centaurus itself. The explosion should destroy the star and wash away most of its planets—including their central hub-planet, Armun. There is no way they can halt Icarus, once he has been launched. No defense is possible. Nothing can stop him. It is a real fact."

"When will he be ready?"

Sherikov's eyes flickered. "Soon."

"Exactly how soon?"

The big Pole hesitated. "As a matter of fact, there's only one thing holding us back."

Sherikov led Reinhart around to the other side of the lab. He pushed a lab guard out of the way.

"See this?" He tapped a round globe, open at one end, the size of a grapefruit. "This is holding us up."

"What is it?"

"The central control turret. This thing brings Icarus back to sub-ftl flight at the correct moment. It must be absolutely accurate. Icarus will be within the star only a matter of a microsecond. If the turret does not function exactly, Icarus will pass

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

out the other side and shoot beyond the Centauran system."

"How near completed is this turret?"

Sherikov hedged uncertainly, spreading out his big hands. "Who can say? It must be wired with infinitely minute equipment—microscope grapples and wires invisible to the naked eye."

"Can you name any completion date?"

Sherikov reached into his coat and brought out a manila folder. "I've drawn up the data for the SRB machines, giving a date of completion. You can go ahead and feed it. I entered ten days as the maximum period. The machines can work from that."

Reinhart accepted the folder cautiously. "You're sure about the date? I'm not convinced. I can trust you, Sherikov."

Sherikov's features darkened. "You'll have to take a chance, Commissioner. I don't trust you any more than you trust me. I know how much you'd like an excuse to get me out of here and one of your puppets in."

Reinhart studied the huge scientist thoughtfully. Sherikov was going to be a hard nut to crack. Designs was responsible to Security, not the Council. Sherikov was losing ground—but he was still a potential danger. Stubborn, individualistic, refusing to subordinate his welfare to the general good.

"All right." Reinhart put the folder slowly away in his coat. "I'll feed it. But you better be able to come through. There can't be any slip-ups. Too much hangs on the next few days."

"If the odds change in our favor are you going to give the mobilization order?"

"Yes," Reinhart stated. "I'll give the order the moment I see the odds change."

Standing in front of the machines, Reinhart waited nervously for the results. It was two o'clock in the afternoon. The day was warm, a pleasant May afternoon. Outside the building the daily life of the planet went on as usual.

As usual? Not exactly. The feeling was in the air, an expanding excitement growing every day. Terra had waited a long time. The attack on Proxima Centaurus had to come—and the sooner the better. The ancient Centauran Empire hemmed in Terra, bottled the human race up in its one system. A vast, suffocating net draped across the heavens, cutting Terra off from the bright diamonds beyond . . . And it had to end.

The SRB machines whirred, the visible combination disap-

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

pearing. For a time no ratio showed. Reinhart tensed, his body rigid. He waited.

The new ratio appeared.

Reinhart gasped. 7-6. Toward Terra!

Within five minutes the emergency mobilization alert had been flashed to all Government departments. The Council and President Duffe had been called to immediate session. Everything was happening fast.

But there was no doubt. 7-6. In Terra's favor. Reinhart hurried frantically to get his papers in order, in time for the Council session.

At histo-research the message plate was quickly pulled from the confidential slot and rushed across the central lab to the chief official.

"Look at this!" Fredman dropped the plate on his superior's desk. "Look at it!"

Harper picked up the plate, scanning it rapidly. "Sounds like the real thing. I didn't think we'd live to see it."

Fredman left the room, hurrying down the hall. He entered the time bubble office. "Where's the bubble?" he demanded, looking around.

One of the technicians looked slowly up. "Back about two hundred years. We're coming up with interesting data on the War of 1914. According to material the bubble has already brought up—"

"Cut it. We're through with routine work. Get the bubble back to the present. From now on all equipment has to be free for Military work."

"But—the bubble is regulated automatically."

"You can bring it back manually."

"It's risky." The technician hedged. "If the emergency requires it, I suppose we could take a chance and cut the automatic."

"The emergency requires *everything*," Fredman said feelingly.

"But the odds might change back," Margaret Duffe, President of the Council, said nervously. "Any minute they can revert."

"This is our chance!" Reinhart snapped, his temper rising. "What the hell's the matter with you? We've waited years for this."

The Council buzzed with excitement. Margaret Duffe hesitated uncertainly, her blue eyes clouded with worry. "I realize the opportunity is here. At least, statistically. But the new odds have just appeared! How do we know they'll last? They stand on the basis of a single weapon."

"You're wrong. You don't grasp the situation." Reinhart

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

held himself in check with great effort. "Sherikov's weapon tipped the ratio in our favor. But the odds have been moving in our direction for months. It was only a question of time. The new balance was inevitable, sooner or later. It's not just Sherikov. He's only one factor in this. It's all nine planets of the Sol System—not a single man."

One of the Councilmen stood up. "The President must be aware the entire planet is eager to end this waiting. All our activities for the past eighty years have been directed toward—"

Reinhart moved close to the slender President of the Council. "If you don't approve the war, there probably will be mass rioting. Public reaction will be strong. Damn strong. And you know it."

Margaret Duffe shot him a cold glance. "You sent out the emergency order to force my hand. You were fully aware of what you were doing. You knew once the order was out there'd be no stopping things."

A murmur rushed through the Council, gaining volume. "We have to approve the war! . . . We're committed! . . . It's too late to turn back!"

Shouts, angry voices, insistent waves of sound lapped around Margaret Duffe. "I'm as much for the war as anybody," she said sharply. "I'm only urging moderation. An inter-system war is a big thing. We're going to war because a machine says we have a statistical chance of winning."

"There's no use starting the war unless we can win it," Reinhart said. "The SRB machines tell us whether we can win."

"They tell us our *chance* of winning. They don't guarantee anything."

"What more can we ask, beside a good chance of winning?"

Margaret Duffe clamped her jaw together tightly. "All right. I hear all the clamor. I won't stand in the way of Council approval. The vote can go ahead." Her cold, alert eyes appraised Reinhart. "Especially since the emergency order has already been sent out to all Government departments."

"Good." Reinhart stepped away with relief. "Then it's settled. We can finally go ahead with full mobilization."

Mobilization proceeded rapidly. The next forty-eight hours were alive with activity.

Reinhart attended a policy-level Military briefing in the Council rooms, conducted by Fleet Commander Carleton.

"You can see our strategy," Carleton said. He traced a diagram on the blackboard with a

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

wave of his hand. "Sherikov states it'll take eight more days to complete the ftl bomb. During that time the fleet we have near the Centauran system will take up positions. As the bomb goes off the fleet will begin operations against the remaining Centauran ships. Many will no doubt survive the blast, but with Armun gone we should be able to handle them."

Reinhart took Commander Carleton's place. "I can report on the economic situation. Every factory on Terra is converted to arms production. With Armun out of the way we should be able to promote mass insurrection among the Centauran colonies. An inter-system Empire is hard to maintain, even with ships that approach light speed. Local war-lords should pop up all over the place. We want to have weapons available for them and ships starting *now* to reach them in time. Eventually we hope to provide a unifying principle around which the colonies can all collect. Our interest is more economic than political. They can have any kind of government they want, as long as they act as supply areas for us. As our eight system planets act now."

Carleton resumed his report. "Once the Centauran fleet has been scattered we can begin the crucial stage of the war. The landing of men and supplies from the ships we have waiting in all key areas throughout the Centauran system. In this stage—"

Reinhart moved away. It was hard to believe only two days had passed since the mobilization order had been sent out. The whole system was alive, functioning with feverish activity. Countless problems were being solved—but much remained.

He entered the lift and ascended to the SRB room, curious to see if there had been any change in the machines' reading. He found it the same. So far so good. Did the Centaurans know about Icarus? No doubt; but there wasn't anything they could do about it. At least, not in eight days.

Kaplan came over to Reinhart, sorting a new batch of data that had come in. The lab organizer searched through his data. "An amusing item came in. It might interest you." He handed a message plate to Reinhart.

It was from histo-research:

May 9, 2136

This is to report that in bringing the research time bubble up to the present the manual return was used for the first time. Therefore a

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

clean break was not made, and a quantity of material from the past was brought forward. This material included an individual from the early twentieth century who escaped from the lab immediately. He has not yet been taken into protective custody. Histo-research regrets this incident, but attributes it to the emergency.

E. Fredman

Reinhart handed the plate back to Kaplan. "Interesting. A man from the past—hauled into the middle of the biggest war the universe has seen."

"Strange things happen. I wonder what the machines will think."

"Hard to say. Probably nothing." Reinhart left the room and hurried along the corridor to his own office.

As soon as he was inside he called Sherikov on the vidscreen, using the confidential line.

The Pole's heavy features appeared. "Good day, Commissioner. How's the war effort?"

"Fine. How's the turret wiring proceeding?"

A faint frown flickered across Sherikov's face. "As a matter of fact, Commissioner—"

"What's the matter?" Reinhart said sharply.

Sherikov floundered. "You know how these things are. I've taken my crew off it and tried robot workers. They have greater dexterity, but they can't make decisions. This calls for more than mere dexterity. This calls for—" He searched for the word. "—for an *artist.*"

Reinhart's face hardened. "Listen, Sherikov. You have eight days left to complete the bomb. The data given to the SRB machines contained that information. The 7-6 ratio is based on that estimate. If you don't come through—"

Sherikov twisted in embarrassment. "Don't get excited, Commissioner. We'll complete it."

"I hope so. Call me as soon as it's done." Reinhart snapped off the connection. If Sherikov let them down he'd have him taken out and shot. The whole war depended on the ftl bomb.

The vidscreen glowed again. Reinhart snapped it on. Kaplan's face formed on it. The lab organizer's face was pale and frozen. "Commissioner, you better come up to the SRB office. Something's happened."

"What is it?"

"I'll show you."

Alarmed, Reinhart hurried out of his office and down the corridor. He found Kaplan standing in front of the SRB machines. "What's the story?"

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Reinhart demanded. He glanced down at the reading. It was unchanged.

"Kaplan held up a message plate nervously. "A moment ago I fed this into the machines. After I saw the results I quickly removed it. It's that item I showed you. From histo-research. About the man from the past."

"What happened when you fed it?"

Kaplan swallowed unhappily. "I'll show you. I'll do it again. Exactly as before." He fed the plate into a moving intake belt. "Watch the visible figures," Kaplan muttered.

Reinhart watched, tense and rigid. For a moment nothing happened. 7-6 continued to show. Then—

The figures disappeared. The machines faltered. New figures showed briefly. 4-24 for Centaurus. Reinhart gasped, suddenly sick with apprehension. But the figures vanished. New figures appeared. 16-38 for Centaurus. Then 48-86. 79-15 in Terra's favor. Then nothing. The machines whirred, but nothing happened.

Nothing at all. No figures. Only a blank.

"What's it mean?" Reinhart muttered, dazed.

"It's fantastic. We didn't think this could—"

"What's happened?"

"The machines aren't able to handle the item. No reading can come. It's data they can't integrate. They can't use it for prediction material, and it throws off all their other figures."

"Why?"

"It's—it's a variable." Kaplan was shaking, white-lipped and pale. "Something from which no inference can be made. The man from the past. The machines can't deal with him. The variable man!"

II

Thomas Cole was sharpening a knife with his whetstone when the tornado hit.

The knife belonged to the lady in the big green house. Every time Cole came by with his Fixit cart the lady had something to be sharpened. Once in awhile she gave him a cup of coffee, hot black—coffee from an old bent pot. He liked that fine; he enjoyed good coffee.

The day was drizzly and overcast. Business had been bad. An automobile had scared his two horses. On bad days less people were outside and he had to get down from the cart and go to ring doorbells.

But the man in the yellow house had given him a dollar for fixing his electric refrigerator. Nobody else had been able to fix

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

it, not even the factory man. The dollar would go a long way. A dollar was a lot.

He knew it was a tornado even before it hit him. Everything was silent. He was bent over his whetstone, the reins between his knees, absorbed in his work.

He had done a good job on the knife; he was almost finished. He spat on the blade and was holding it up to see—and then the tornado came.

All at once it was there, completely around him. Nothing but grayness. He and the cart and horses seemed to be in a calm spot in the center of the tornado. They were moving in a great silence, gray mist everywhere.

And while he was wondering what to do, and how to get the lady's knife back to her, all at once there was a bump and the tornado tipped him over, sprawled out on the ground. The horses screamed in fear, struggling to pick themselves up. Cole got quickly to his feet.

Where was he?

The grayness was gone. White walls stuck up on all sides. A deep light gleamed down, not daylight but something like it. The team was pulling the cart on its side, dragging it along, tools and equipment falling out. Cole righted the cart, leaping up onto the seat.

And for the first time saw the people.

Men, with astonished white faces, in some sort of uniforms. Shouts, noise and confusion. And a feeling of danger!

Cole headed the team toward the door. Hoofs thundered steel against steel as they pounded through the doorway, scattering the astonished men in all directions. He was out in a wide hall. A building, like a hospital.

The hall divided. More men were coming, spilling from all sides.

Shouting and milling in excitement, like white ants. Something cut past him, a beam of dark violet. It seared off a corner of the cart, leaving the wood smoking.

Cole felt fear. He kicked at the terrified horses. They reached a big door, crashing wildly against it. The door gave—and they were outside, bright sunlight blinking down on them. For a sickening second the cart tilted, almost turning over. Then the horses gained speed, racing across an open field, toward a distant line of green, Cole holding tightly to the reins.

Behind him the little white-faced men had come out and were standing in a group, gesturing frantically. He could hear their faint shrill shouts.

But he had got away. He was

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

safe. He slowed the horses down and began to breathe again.

The woods were artificial. Some kind of park. But the park was wild and overgrown. A dense jungle of twisted plants. Everything growing in confusion.

The park was empty. No one was there. By the position of the sun he could tell it was either early morning or late afternoon. The smell of the flowers and grass, the dampness of the leaves, indicated morning. It had been late afternoon when the tornado had picked him up. And the sky had been overcast and cloudy.

Cole considered. Clearly, he had been carried a long way. The hospital, the men with white faces, the odd lighting, the accented words he had caught—everything indicated he was no longer in Nebraska—maybe not even in the United States.

Some of his tools had fallen out and gotten lost along the way. Cole collected everything that remained, sorting them, running his fingers over each tool with affection. Some of the little chisels and wood gouges were gone. The bit box had opened, and most of the smaller bits had been lost. He gathered up those that remained and replaced them tenderly in the box. He took a key-hole saw down, and with an oil rag wiped it carefully and replaced it.

Above the cart the sun rose slowly in the sky. Cole peered up, his horny hand over his eyes. A big man, stoop-shouldered, his chin gray and stubbled. His clothes wrinkled and dirty. But his eyes were clear, a pale blue, and his hands were finely made.

He could not stay in the park. They had seen him ride that way; they would be looking for him.

Far above something shot rapidly across the sky. A tiny black dot moving with incredible haste. A second dot followed. The two dots were gone almost before he saw them. They were utterly silent.

Cole frowned, perturbed. The dots made him uneasy. He would have to keep moving—and looking for food. His stomach was already beginning to rumble and groan.

Work. There was plenty he could do: gardening, sharpening, grinding, repair work on machines and clocks, fixing all kinds of household things. Even painting and odd jobs and carpentry and chores.

He could do anything. Anything people wanted done. For a meal and pocket money.

Thomas Cole urged the team into life, moving forward. He sat hunched over in the seat,

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

watching intently, as the Fixit cart rolled slowly across the tangled grass, through the jungle of trees and flowers.

Reinhart hurried, racing his cruiser at top speed, followed by a second ship, a military escort. The ground sped by below him, a blur of gray and green.

The remains of New York lay spread out, a twisted, blunted ruin overgrown with weeds and grass. The great atomic wars of the twentieth century had turned virtually the whole seaboard area into an endless waste of slag.

Slag and weeds below him. And then the sudden tangle that had been Central Park.

Histo-research came into sight. Reinhart swooped down, bringing his cruiser to rest at the small supply field behind the main buildings.

Harper, the chief official of the department, came quickly over as soon as Reinhart's ship landed.

"Frankly, we don't understand why you consider this matter important," Harper said uneasily.

Reinhart shot him a cold glance. "I'll be the judge of what's important. Are you the one who gave the order to bring the bubble back manually?"

"Fredman gave the actual order. In line with your directive to have all facilities ready for—"

Reinhart headed toward the entrance of the research building. "Where is Fredman?"

"Inside."

"I want to see him. Let's go."

Fredman met them inside. He greeted Reinhart calmly, showing no emotion. "Sorry to cause you trouble, Commissioner. We were trying to get the station in order for the war. We wanted the bubble back as quickly as possible." He eyed Reinhart curiously. "No doubt the man and his cart will soon be picked up by your police."

"I want to know everything that happened, in exact detail."

Fredman shifted uncomfortably. "There's not much to tell. I gave the order to have the automatic setting canceled and the bubble brought back manually. At the moment the signal reached it, the bubble was passing through the spring of 1913. As it broke loose, it tore off a piece of ground on which this person and his cart were located. The person naturally was brought up to the present, inside the bubble."

"Didn't any of your instruments tell you the bubble was loaded?"

"We were too excited to take any readings. Half an hour after

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

the manual control was thrown, the bubble materialized in the observation room. It was de-energized before anyone noticed what was inside. We tried to stop him but he drove the cart out into the hall, bowling us out of the way. The horses were in a panic."

"What kind of cart was it?"

"There was some kind of sign on it. Painted in black letters on both sides. No one saw what it was."

"Go ahead. What happened then?"

"Somebody fired a Slem-ray after him, but it missed. The horses carried him out of the building and onto the grounds. By the time we reached the exit the cart was half way to the park."

Reinhart reflected. "If he's still in the park we should have him shortly. But we must be careful." He was already starting back toward his ship, leaving Fredman behind. Harper fell in beside him.

Reinhart halted by his ship. He beckoned some Government guards over. "Put the executive staff of this department under arrest. I'll have them tried on a treason count, later on." He smiled ironically as Harper's face blanched sickly pale. "There's a war going on. You'll be lucky if you get off alive."

Reinhart entered his ship and left the surface, rising rapidly into the sky. A second ship followed after him, a military escort. Reinhart flew high above the sea of gray slag, the unrecovered waste area. He passed over a sudden square of green set in the ocean of gray. Reinhart gazed back at it until it was gone.

Central Park. He could see police ships racing through the sky, ships and transports loaded with troops, heading toward the square of green. On the ground some heavy guns and surface cars rumbled along, lines of black approaching the park from all sides.

They would have the man soon. But meanwhile, the SRB machines were blank. And on the SRB machines' readings the whole war depended.

About noon the cart reached the edge of the park. Cole rested for a moment, allowing the horses time to crop at the thick grass. The silent expanse of slag amazed him. What had happened? Nothing stirred. No buildings, no sign of life. Grass and weeds poked up occasionally through it, breaking the flat surface here and there, but even so, the sight gave him an uneasy chill.

Cole drove the cart slowly out onto the slag, studying the sky

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

above him. There was nothing to hide him, now that he was out of the park. The slag was bare and uniform, like the ocean. If he were spotted—

A horde of tiny black dots raced across the sky, coming rapidly closer. Presently they veered to the right and disappeared. More planes, wingless metal-planes. He watched them go, driving slowly on.

Half an hour later something appeared ahead. Cole slowed the cart down, peering to see. The slag came to an end. He had reached its limits. Ground appeared, dark soil and grass. Weeds grew everywhere. Ahead of him, beyond the end of the slag, was a line of buildings; houses of some sort. Or sheds.

Houses, probably. But not like any he had ever seen.

The houses were uniform, all exactly the same. Like little green shells, rows of them, several hundred. There was a little lawn in front of each. Lawn, a path, a front porch, bushes in a meager row around each house. But the houses were all alike and very small.

Little green shells in precise, even rows. He urged the cart cautiously forward, toward the houses.

No one seemed to be around. He entered a street between two rows of houses, the hoofs of his two horses sounding loudly in the silence. He was in some kind of town. But there were no dogs or children. Everything was neat and silent. Like a model. An exhibit. It made him uncomfortable.

A young man walking along the pavement gaped at him in wonder. An oddly-dressed youth, in a toga-like cloak that hung down to his knees. A single piece of fabric. And sandals.

Or what looked like sandals. Both the cloak and the sandals were of some strange half-luminous material. It glowed faintly in the sunlight. Metallic, rather than cloth.

A woman was watering flowers at the edge of a lawn. She straightened up as his team of horses came near. Her eyes widened in astonishment—and then fear. Her mouth fell open in a soundless *O* and her sprinkling can slipped from her fingers and rolled silently onto the lawn.

Cole blushed and turned his head quickly away. The woman was scarcely dressed! He flicked the reins and urged the horses to hurry.

Behind him, the woman still stood. He stole a brief, hasty look back—and then shouted hoarsely to his team, ears scarlet. He had seen right. She wore only a pair of translucent

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

shorts. Nothing else. A mere fragment of the same half-luminous material that glowed and sparkled. The rest of her small body was utterly naked.

He slowed the team down. She had been pretty. Brown hair and eyes, deep red lips. Quite a good figure. Slender waist, downy legs, bare and supple, full breasts— He clamped the thought furiously off. He had to get to work. Business.

Cole halted the Fixit cart and leaped down onto the pavement. He selected a house at random and approached it cautiously. The house was attractive. It had a certain simple beauty. But it looked frail—and exactly like the others.

He stepped up on the porch. There was no bell. He searched for it, running his hand uneasily over the surface of the door. All at once there was a click, a sharp snap on a level with his eyes. Cole glanced up, startled. A lens was vanishing as the door section slid over it. He had been photographed.

While he was wondering what it meant, the door swung suddenly open. A man filled up the entrance, a big man in a tan uniform, blocking the way ominously.

"What do you want?" the man demanded.

"I'm looking for work," Cole murmured. "Any kind of work. I can do anything, fix any kind of thing. I repair broken objects. Things that need mending." His voice trailed off uncertainly. "Anything at all."

"Apply to the Placement Department of the Federal Activities Control Board," the man said crisply. "You know all occupational therapy is handled through them." He eyed Cole curiously. "Why have you got on those ancient clothes?"

"Ancient? Why, I—"

The man gazed past him at the Fixit cart and the two dozing horses. "What's that? What are those two animals? *Horses?*" The man rubbed his jaw, studying Cole intently. "That's strange," he said.

"Strange?" Cole murmured uneasily. "Why?"

"There haven't been any horses for over a century. All the horses were wiped out during the Fifth Atomic War. That's why it's strange."

Cole tensed, suddenly alert. There was something in the man's eyes, a hardness, a piercing look. Cole moved back off the porch, onto the path. He had to be careful. Something was wrong.

"I'll be going," he murmured.

"There haven't been any horses for over a hundred years." The man came toward

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Cole. "Who are you? Why are you dressed up like that? Where did you get that vehicle and pair of horses?"

"I'll be going," Cole repeated, moving away.

The man whipped something from his belt, a thin metal tube. He stuck it toward Cole.

It was a rolled-up paper, a thin sheet of metal in the form of a tube. Words, some kind of script. He could not make any of them out. The man's picture, rows of numbers, figures—

"I'm Director Winslow," the man said. "Federal Stockpile Conservation. You better talk fast, or there'll be a Security car here in five minutes."

Cole moved—fast. He raced, head down, back along the path to the cart, toward the street.

Something hit him. A wall of force, throwing him down on his face. He sprawled in a heap, numb and dazed. His body ached, vibrating wildly, out of control. Waves of shock rolled over him, gradually diminishing.

He got shakily to his feet. His head spun. He was weak, shattered, trembling violently. The man was coming down the walk after him. Cole pulled himself onto the cart, gasping and retching. The horses jumped into life. Cole rolled over against the seat, sick with the motion of the swaying cart.

He caught hold of the reins and managed to drag himself up in a sitting position. The cart gained speed, turning a corner. Houses flew past. Cole urged the team weakly, drawing great shuddering breaths. Houses and streets, a blur of motion, as the cart flew faster and faster along.

Then he was leaving the town, leaving the neat little houses behind. He was on some sort of highway. Big buildings, factories, on both sides of the highway. Figures, men watching in astonishment.

After awhile the factories fell behind. Cole slowed the team down. What had the man meant? Fifth Atomic War. Horses destroyed. It didn't make sense. And they had things he knew nothing about. Force fields. Planes without wings—soundless.

Cole reached around in his pockets. He found the identification tube the man had handed him. In the excitement he had carried it off. He unrolled the tube slowly and began to study it. The writing was strange to him.

For a long time he studied the tube. Then, gradually, he became aware of something. Something in the top right-hand corner.

A date. October 6, 2128.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Cole's vision blurred. Everything spun and wavered around him. October, 2128. Could it be?

But he held the paper in his hand. Thin, metal paper. Like foil. And it had to be. It said so, right in the corner, printed on the paper itself.

Cole rolled the tube up slowly, numbed with shock. Two hundred years. It didn't seem possible. But things were beginning to make sense. He was in the future, two hundred years in the future.

While he was mulling this over, the swift black Security ship appeared overhead, diving rapidly toward the horse-drawn cart, as it moved slowly along the road.

Reinhart's vidscreen buzzed. He snapped it quickly on. "Yes?"

"Report from Security."

"Put it through." Reinhart waited tensely as the lines locked in place. The screen re-lit.

"This is Dixon. Western Regional Command." The officer cleared his throat, shuffling his message plates. "The man from the past has been reported, moving away from the New York area."

"Which side of your net?"

"Outside. He evaded the net around Central Park by entering one of the small towns at the rim of the slag area."

"Evaded?"

"We assumed he would avoid the towns. Naturally the net failed to encompass any of the towns."

Reinhart's jaw stiffened. "Go on."

"He entered the town of Petersville a few minutes before the net closed around the park. We burned the park level, but naturally found nothing. He had already gone. An hour later we received a report from a resident in Petersville, an official of the Stockpile Conservation Department. The man from the past had come to his door, looking for work. Winslow, the official, engaged him in conversation, trying to hold onto him, but he escaped, driving his cart off. Winslow called Security right away, but by then it was too late."

"Report to me as soon as anything more comes in. We must have him—and damn soon." Reinhart snapped the screen off. It died quickly.

He sat back in his chair, waiting.

Cole saw the shadow of the Security ship. He reacted at once. A second after the shadow passed over him, Cole was out of the cart, running and falling. He rolled, twisting and turning, pulling his body as far away from the cart as possible.

There was a blinding roar and

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

flash of white light. A hot wind rolled over Cole, picking him up and tossing him like a leaf. He shut his eyes, letting his body relax. He bounced, falling and striking the ground. Gravel and stones tore into his face, his knees, the palms of his hands.

Cole cried out, shrieking in pain. His body was on fire. He was being consumed, incinerated by the blinding white orb of fire. The orb expanded, growing in size, swelling like some monstrous sun, twisted and bloated. The end had come. There was no hope. He gritted his teeth—

The greedy orb faded, dying down. It sputtered and winked out, blackening into ash. The air reeked, a bitter acrid smell. His clothes were burning and smoking. The ground under him was hot, baked dry, seared by the blast. But he was alive. At least, for awhile.

Cole opened his eyes slowly. The cart was gone. A great hole gaped where it had been, a shattered sore in the center of the highway. An ugly cloud hung above the hole, black and ominous. Far above, the wingless plane circled, watching for any signs of life.

Cole lay, breathing shallowly, slowly. Time passed. The sun moved across the sky with agonizing slowness. It was perhaps four in the afternoon. Cole calculated mentally. In three hours it would be dark. If he could stay alive until then—

Had the plane seen him leap from the cart?

He lay without moving. The late afternoon sun beat down on him. He felt sick, nauseated and feverish. His mouth was dry.

Some ants ran over his outstretched hand. Gradually, the immense black cloud was beginning to drift away, dispersing into a formless blob.

The cart was gone. The thought lashed against him, pounding at his brain, mixing with his labored pulse-beat. *Gone* Destroyed. Nothing but ashes and debris remained. The realization dazed him.

Finally the plane finished its circling, winging its way toward the horizon. At last it vanished. The sky was clear.

Cole got unsteadily to his feet. He wiped his face shakily. His body ached and trembled. He spat a couple times, trying to clear his mouth. The plane would probably send in a report. People would be coming to look for him. Where could he go?

To his right a line of hills rose up, a distant green mass. Maybe he could reach them. He began to walk slowly. He had to be very careful. They were look-

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

ing for him—and they had weapons. Incredible weapons.

He would be lucky to still be alive when the sun set. His team and Fixit cart were gone—and all his tools. Cole reached into his pockets, searching through them hopefully. He brought out some small screwdrivers, a little pair of cutting pliers, some wire, some solder, the whetstone, and finally the lady's knife.

Only a few small tools remained. He had lost everything else. But without the cart he was safer, harder to spot. They would have more trouble finding him, on foot.

Cole hurried along, crossing the level fields toward the distant range of hills.

The call came through to Reinhart almost at once. Dixon's features formed on the vid-screen. "I have a further report, Commissioner." Dixon scanned the plate. "Good news. The man from the past was sighted moving away from Petersville, along highway 13, at about ten miles an hour, on his horse-drawn cart. Our ship bombed him immediately."

"Did—did you get him?"

"The pilot reports no sign of life after the blast."

Reinhart's pulse almost stopped. He sank back in his chair. "Then he's dead!"

"Actually, we won't know for certain until we can examine the debris. A surface car is speeding toward the spot. We should have the complete report in a short time. We'll notify you as soon as the information comes in."

Reinhart reached out and cut the screen. It faded into darkness. Had they got the man from the past? Or had he escaped again? Weren't they ever going to get him? Couldn't he be captured? And meanwhile, the SRB machines were silent, showing nothing at all.

Reinhart sat brooding, waiting impatiently for the report of the surface car to come in.

It was evening.

"Come on!" Steven shouted, running frantically after his brother. "Come on back!"

"Catch me." Earl ran and ran, down the side of the hill, over behind a military storage depot, along a neotex fence, jumping finally down into Mrs. Norris' back yard.

Steven hurried after his brother, sobbing for breath, shouting and gasping as he ran. "Come back! You come back with that!"

"What's he got?" Sally Tate demanded, stepping out suddenly to block Steven's way.

Steven halted, his chest rising and falling. "He's got my inter-

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

system vidsender." His small face twisted with rage and misery. "He better give it back!"

Earl came circling around from the right. In the warm gloom of evening he was almost invisible. "Here I am," he announced. "What you going to do?"

Steven glared at him hotly. His eyes made out the square box in Earl's hands. "You give that back! Or—or I'll tell Dad."

Earl laughed. "Make me."

"Dad'll make you."

"You better give it to him," Sally said.

"Catch me." Earl started off. Steven pushed Sally out of the way, lashing wildly at his brother. He collided with him, throwing him sprawling. The box fell from Earl's hands. It skidded to the pavement, crashing into the side of a guide-light post.

Earl and Steven picked themselves up slowly. They gazed down at the broken box.

"See?" Steven shrilled, tears filling his eyes. "See what you did?"

"You did it. You pushed into me."

"You did it!" Steven bent down and picked up the box. He carried it over to the guide-light, sitting down on the curb to examine it.

Earl came slowly over. "If you hadn't pushed me it wouldn't have got broken."

Night was descending rapidly. The line of hills rising above the town were already lost in darkness. A few lights had come on here and there. The evening was warm. A surface car slammed its doors, some place off in the distance. In the sky ships droned back and forth, weary commuters coming home from work in the big underground factory units.

Thomas Cole came slowly toward the three children grouped around the guide-light. He moved with difficulty, his body sore and bent with fatigue. Night had come, but he was not safe yet.

He was tired, exhausted and hungry. He had walked a long way. And he had to have something to eat—soon.

A few feet from the children Cole stopped. They were all intent and absorbed by the box on Steven's knees. Suddenly a hush fell over the children. Earl looked up slowly.

In the dim light the big stooped figure of Thomas Cole seemed extra menacing. His long arms hung down loosely at his sides. His face was lost in shadow. His body was shapeless, indistinct. A big unformed statue, standing silently a few

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

feet away, unmoving in the half-darkness.

"Who are you?" Earl demanded, his voice low.

"What do you want?" Sally said. The children edged away nervously. "Get away."

Cole came toward them. He bent down a little. The beam from the guide-light crossed his features. Lean, prominent nose, beak-like, faded blue eyes—

Steven scrambled to his feet, clutching the vidsender box. "You get out of here!"

"Wait." Cole smiled crookedly at them. His voice was dry and raspy. "What do you have there?" He pointed with his long, slender fingers. "The box you're holding."

The children were silent. Finally Steven stirred. "It's my inter-system vidsender."

"Only it doesn't work," Sally said.

"Earl broke it." Steven glared at his brother bitterly. "Earl threw it down and broke it."

Cole smiled a little. He sank down wearily on the edge of the curb; sighing with relief. He had been walking too long. His body ached with fatigue. He was hungry and tired. For a long time he sat, wiping perspiration from his neck and face, too exhausted to speak.

"Who are you?" Sally demanded, at last. "Why do you have on those funny clothes? Where did you come from?"

"Where?" Cole looked around at the children. "From a long way off. A long way." He shook his head slowly from side to side, trying to clear it.

"What's your therapy?" Earl said.

"My therapy?"

"What do you do? Where do you work?"

Cole took a deep breath and let it out again slowly. "I fix things. All kinds of things. Any kind."

Earl sneered. "Nobody fixes things. When they break you throw them away."

Cole didn't hear him. Sudden need had roused him, getting him suddenly to his feet. "You know any work I can find?" he demanded. "Things I could do? I can fix anything. Clocks, typewriters, refrigerators, pots and pans. Leaks in the roof. I can fix anything there is."

Steven held out his inter-system vidsender. "Fix this."

There was silence. Slowly, Cole's eyes focussed on the box. "That?"

"My sender. Earl broke it."

Cole took the box slowly. He turned it over, holding it up to the light. He frowned, concentrating on it. His long, slender fingers moved carefully over the surface, exploring it.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

"He'll steal it!" Earl said suddenly.

"No." Cole shook his head vaguely. "I'm reliable." His sensitive fingers found the studs that held the box together. He depressed the studs, pushing them expertly in. The box opened, revealing its complex interior.

"He got it open," Sally whispered.

"Give it back!" Steven demanded, a little frightened. He held out his hand. "I want it back."

The three children watched Cole apprehensively. Cole fumbled in his pocket. Slowly he brought out his tiny screwdrivers and pliers. He laid them in a row beside him. He made no move to return the box.

"I want it back," Steven said feebly.

Cole looked up. His faded blue eyes took in the sight of the three children standing before him in the gloom. "I'll fix it for you. You said you wanted it fixed."

"I want it back." Steven stood on one foot, then the other, torn by doubt and indecision. "Can you really fix it? Can you make it work again?"

"Yes."

"All right. Fix it for me, then."

A sly smile flickered across Cole's tired face. "Now, wait a minute. If I fix it, will you bring me something to eat? I'm not fixing it for nothing."

"Something to eat?"

"Food. I need hot food. Maybe some coffee."

Steven nodded. "Yes. I'll get it for you."

Cole relaxed. "Fine. That's fine." He turned his attention back to the box resting between his knees. "Then I'll fix it for you. I'll fix it for you good."

His fingers flew, working and twisting, tracing down wires and relays, exploring and examing. Finding out about the intersystem vidsender. Discovering how it worked.

Steven slipped into the house through the emergency door. He made his way to the kitchen with great care, walking on tip-toe. He punched the kitchen controls at random, his heart beating excitedly. The stove began to whirr, purring into life. Meter readings came on, crossing toward the completion marks.

Presently the stove opened, sliding out a tray of steaming dishes. The mechanism clicked off, dying into silence. Steven grabbed up the contents of the tray, filling his arms. He carried everything down the hall, out the emergency door and into the yard. The yard was dark. Steven felt his way carefully along.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

He managed to reach the guide-light without dropping anything at all.

Thomas Cole got slowly to his feet as Steven came into view. "Here," Steven said. He dumped the food onto the curb, gasping for breath. "Here's the food. Is it finished?"

Cole held out the inter-system vidsender. "It's finished. It was pretty badly smashed."

Earl and Sally gazed up, wide-eyed. "Does it work?" Sally asked.

"Of course not," Earl stated. "How could it work? He couldn't—"

"Turn it on!" Sally nudged Steven eagerly. "See if it works."

Steven was holding the box under the light, examining the switches. He clicked the main switch on. The indicator light gleamed. "It lights up," Steven said.

"Say something into it."

Steven spoke into the box. "Hello! Hello! This is operator 6-Z75 calling. Can you hear me? This is operator 6-Z75. Can you hear me?"

In the darkness, away from the beam of the guide-light, Thomas Cole sat crouched over the food. He ate gratefully, silently. It was good food, well cooked and seasoned. He drank a container of orange juice and then a sweet drink he didn't recognize. Most of the food was strange to him, but he didn't care. He had walked a long way and he was plenty hungry. And he still had a long way to go, before morning. He had to be deep in the hills before the sun came up. Instinct told him that he would be safe among the trees and tangled growth—at least, as safe as he could hope for.

He ate rapidly intent on the food. He did not look up until he was finished. Then he got slowly to his feet, wiping his mouth with the back of his hand.

The three children were standing around in a circle, operating the inter-system vidsender. He watched them for a few minutes. None of them looked up from the small box. They were intent, absorbed in what they were doing.

"Well?" Cole said, at last. "Does it work all right?"

After a moment Steven looked up at him. There was a strange expression on his face. He nodded slowly. "Yes. Yes, it works. It works fine."

Cole grunted. "All right." He turned and moved away from the light. "That's fine."

The children watched silently until the figure of Thomas Cole had completely disappeared. Slowly, they turned and looked at each other. Then down at the

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

box in Steven's hands. They gazed at the box in growing awe. Awe mixed with dawning fear.

Steven turned and edged toward his house. "I've got to show it to my Dad," he murmured, dazed. "He's got to know. *Somebody's* got to know!"

III

Eric Reinhart examined the vidsender box carefully, turning it around and around.

"Then he did escape from the blast," Dixon admitted reluctantly. "He must have leaped from the cart just before the concussion."

Reinhart nodded. "He escaped. He got away from you—twice." He pushed the vidsender box away and leaned abruptly toward the man standing uneasily in front of his desk. "What's your name again?"

"Elliot. Richard Elliot."

"And your son's name?"

"Steven."

"It was last night this happened?"

"About eight o'clock."

"Go on."

"Steven came into the house. He acted queerly. He was carrying his inter-system vidsender." Elliot pointed at the box on Reinhart's desk. "That. He was nervous and excited. I asked what was wrong. For awhile he couldn't tell me. He was quite upset. Then he showed me the vidsender." Elliot took a deep, shaky breath. "I could see right away it was different. You see I'm an electrical engineer. I had opened it once before, to put in a new battery. I had a fairly good idea how it should look." Elliot hesitated. "Commissioner, it had been *changed*. A lot of the wiring was different. Moved around. Relays connected differently. Some parts were missing. New parts had been jury rigged out of old. Then I discovered the thing that made me call Security. The vidsender—it really *worked*."

"Worked?"

"You see, it never was anything more than a toy. With a range of a few city blocks. So the kids could call back and forth from their rooms. Like a sort of portable vidscreen. Commissioner, I tried out the vidsender, pushing the call button and speaking into the microphone. I—I got a ship of the line. A battleship, operating beyond Proxima Centaurus—over eight light years away. As far out as the actual vidsenders operate. Then I called Security. Right away."

For a time Reinhart was silent. Finally he tapped the box lying on the desk. "You got a ship of the line—with *this?*"

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

"That's right."

"How big are the regular vidsenders?"

Dixon supplied the information. "As big as a twenty-ton safe."

"That's what I thought." Reinhart waved his hand impatiently. "All right, Elliot. Thanks for turning the information over to us. That's all."

Security police led Elliot outside the office.

Reinhart and Dixon looked at each other. "This is bad," Reinhart said harshly. "He has some ability, some kind of mechanical ability. Genius, perhaps, to do a thing like this. Look at the period he came from, Dixon. The early part of the twentieth century. Before the wars began. That was a unique period. There was a certain vitality, a certain ability. It was a period of incredible growth and discovery. Edison. Pasteur. Burbank. The Wright brothers. Inventions and machines. People had an uncanny ability with machines. A kind of intuition about machines—which we don't have."

"You mean—"

"I mean a person like this coming into our own time is bad in itself, war or no war. He's too different. He's oriented along different lines. He has abilities we lack. This fixing skill of his. It throws us off, out of kilter. And with the war . . .

"Now I'm beginning to understand why the SRB machines couldn't factor him. It's impossible for us to understand this kind of person. Winslow says he asked for work, any kind of work. The man said he could do anything, fix anything. Do you understand what that means?"

"No," Dixon said. "What does it mean?"

"Can any of us fix anything? No. None of us can do that. We're specialized. Each of us has his own line, his own work. I understand my work, you understand yours. The tendency in evolution is toward greater and greater specialization. Man's society is an ecology that forces adaptation to it. Continual complexity makes it impossible for any of us to know anything outside our own personal field—I can't follow the work of the man sitting at the next desk over from me. Too much knowledge has piled up in each field. And there's too many fields.

"This man is different. He can fix anything, do anything. He doesn't work with knowledge, with science—the classified accumulation of facts. He *knows* nothing. It's not in his head, a form of learning. He works by intuition—his power is in his

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

hands, not his head. Jack-of-all-trades. His hands! Like a painter; an artist. In his hands—and he cuts across our lives like a knife-blade."

"And the other problem?"

"The other problem is that this man, this variable man, has escaped into the Albertine Mountain range. Now we'll have one hell of a time finding him. He's clever—in a strange kind of way. Like some sort of animal. He's going to be hard to catch."

Reinhart sent Dixon out. After a moment he gathered up the handful of reports on his desk, and carried them up to the SRB room. The SRB room was closed up, sealed off by a ring of armed Security police. Standing angrily before the ring of police was Peter Sherikov, his beard wagging angrily, his immense hands in his hips.

"What's going on?" Sherikov demanded. "Why can't I go in and peep at the odds?"

"Sorry." Reinhart cleared the police aside. "Come inside with me. I'll explain." The doors opened for them and they entered. Behind them the doors shut and the ring of police formed outside. "What brings you away from your lab?" Reinhart asked.

Sherikov shrugged. "Several things. I wanted to see you. I called you on the vidphone and they said you weren't available. I thought maybe something had happened. What's up?"

"I'll tell you in a few minutes." Reinhart called Kaplan over. "Here are some new items. Feed them in right away. I want to see if the machines can total them."

"Certainly, Commissioner." Kaplan took the message plates and placed them on an intake belt. The machines hummed into life.

"We'll know soon," Reinhart said, half aloud.

Sherikov shot him a keen glance. "We'll know what? Let me in on it. What's taking place?"

"We're in trouble. For twenty-four hours the machines haven't given any reading at all. Nothing but a blank. A total blank."

Sherikov's features registered disbelief. "But that isn't possible. *Some* odds exist at all times."

"The odds exist, but the machines aren't able to calculate them."

"Why not?"

"Because a variable factor has been introduced. A factor which the machines can't handle. They can't make any predictions from it."

"Can't they reject it?" Sherikov said slyly. "Can't they just—just *ignore* it?"

"No. It exists, as real data.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Therefore it affects the balance of the material, the sum total of all other available data. To reject it would be to give a false reading. The machines can't reject any data that's known to be true."

Sherikov pulled moodily at his black beard. "I would be interested in knowing what sort of factor the machines can't handle. I thought they could take in all data pertaining to contemporary reality."

"They can. This factor has nothing to do with contemporary reality. That's the trouble. Histo-research in bringing its time bubble back from the past got overzealous and cut the circuit too quickly. The bubble came back loaded—with a man from the twentieth century. A man from the past."

"I see. A man from two centuries ago." The big Pole frowned. "And with a radically different Weltanschauung. No connection with our present society. Not integrated along our lines at all. Therefore the SRB machines are perplexed."

Reinhart grinned. "Perplexed? I suppose so. In any case, they can't do anything with the data about this man. The variable man. No statistics at all have been thrown up—no predictions have been made. And it knocks everything else out of phase. We're dependent on the constant showing of these odds. The whole war effort is geared around them."

"The horse-shoe nail. Remember the old poem? 'For want of a nail the shoe was lost. For want of the shoe the horse was lost. For want of the horse the rider was lost. For want—' "

"Exactly. A single factor coming along like this, one single individual, can throw everything off. It doesn't seem possible that one person could knock an entire society out of balance—but apparently it is."

"What are you doing about this man?"

"The Security police are organized in a mass search for him."

"Results?"

"He escaped into the Albertine Mountain Range last night. It'll be hard to find him. We must expect him to be loose for another forty-eight hours. It'll take that long for us to arrange the annihilation of the range area. Perhaps a trifle longer. And meanwhile—"

"Ready, Commissioner," Kaplan interrupted. "The new totals."

The SRB machines had finished factoring the new data. Reinhart and Sherikov hurried to take their places before the view windows.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

For a moment nothing happened. Then odds were put up, locking in place.

Sherikov gasped. 99-2. In favor of Terra. "That's wonderful! Now we—"

The odds vanished. New odds took their places. 97-4. In favor of Centaurus. Sherikov groaned in astonished dismay. "Wait," Reinhart said to him. "I don't think they'll last."

The odds vanished. A rapid series of odds shot across the screen, a violent stream of numbers, changing almost instantly. At last the machines became silent.

Nothing showed. No odds. No totals at all. The view windows were blank.

"You see?" Reinhart murmured. "The same damn thing!"

Sherikov pondered. "Reinhart, you're too Anglo-Saxon, too impulsive. Be more Slavic. This man will be captured and destroyed within two days. You said so yourself. Meanwhile, we're all working night and day on the war effort. The warfleet is waiting near Proxima, taking up positions for the attack on the Centaurans. All our war plants are going full blast. By the time the attack date comes we'll have a full-sized invasion army ready to take off for the long trip to the Centauran colonies. The whole Terran population has been mobilized. The eight supply planets are pouring in material. All this is going on, day and night, even without odds showing. Long before the attack comes this man will certainly be dead, and the machines will be able to show odds again."

Reinhart considered. "But it worries me, a man like that out in the open. Loose. A man who can't be predicted. It goes against science. We've been making statistical reports on society for two centuries. We have immense files of data. The machines are able to predict what each person and group will do at a given time, in a given situation. But this man is beyond all prediction. He's a variable. It's contrary to science."

"The indeterminate particle."

"What's that?"

"The particle that moves in such a way that we can't predict what position it will occupy at a given second. Random. The random particle."

"Exactly. It's — it's *unnatural.*"

Sherikov laughed sarcastically. "Don't worry about it, Commissioner. The man will be captured and things will return to their natural state. You'll be able to predict people again, like laboratory rats in a maze. By the way—why is this room guarded?"

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

"I don't want anyone to know the machines show no totals. It's dangerous to the war effort."

"Margaret Duffe, for example?"

Reinhart nodded reluctantly. "They're too timid, these parliamentarians. If they discover we have no SRB odds they'll want to shut down the war planning and go back to waiting."

"Too slow for you, Commissioner? Laws, debates, council meetings, discussions. . . . Saves a lot of time if one man has all the power. One man to tell people what to do, think for them, lead them around."

Reinhart eyed the big Pole critically. "That reminds me. How is Icarus coming? Have you continued to make progress on the control turret?"

A scowl crossed Sherikov's broad features. "The control turret?" He waved his big hand vaguely. "I would say it's coming along all right. We'll catch up in time."

Instantly Reinhart became alert. "Catch up? You mean you're still behind?"

"Somewhat. A little. But we'll catch up." Sherikov retreated toward the door. "Let's go down to the cafeteria and have a cup of coffee. You worry too much, Commissioner. Take things more in your stride."

"I suppose you're right." The two men walked out into the hall. "I'm on edge. This variable man. I can't get him out of my mind."

"Has he done anything yet?"

"Nothing important. Rewired a child's toy. A toy vidsender."

"Oh?" Sherikov showed interest. "What do you mean? What did he do?"

"I'll show you." Reinhart led Sherikov down the hall to his office. They entered and Reinhart locked the door. He handed Sherikov the toy and roughed in what Cole had done. A strange look crossed Sherikov's face. He found the studs on the box and depressed them. The box opened. The big Pole sat down at the desk and began to study the interior of the box. "You're sure it was the man from the past who rewired this?"

"Of course. On the spot. The boy damaged it playing. The variable man came along and the boy asked him to fix it. He fixed it, all right."

"Incredible." Sherikov's eyes were only an inch from the wiring. "Such tiny relays. How could he—"

"What?"

"Nothing." Sherikov got abruptly to his feet, closing the box carefully. "Can I take this along? To my lab? I'd like to analyze it more fully."

"Of course. But why?"

"No special reason. Let's go

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

get our coffee." Sherikov headed toward the door. "You say you expect to capture this man in a day or so?"

"*Kill* him, not capture him. We've got to eliminate him as a piece of data. We're assembling the attack formations right now. No slip-ups, this time. We're in the process of setting up a cross-bombing pattern to level the entire Albertine range. He must be destroyed, within the next forty-eight hours."

Sherikov nodded absently. "Of course," he murmured. A preoccupied expression still remained on his broad features. "I understand perfectly."

Thomas Cole crouched over the fire he had built, warming his hands. It was almost morning. The sky was turning violet gray. The mountain air was crisp and chill. Cole shivered and pulled himself closer to the fire.

The heat felt good against his hands. *His hands.* He gazed down at them, glowing yellow-red in the firelight. The nails were black and chipped. Warts and endless calluses on each finger, and the palms. But they were good hands; the fingers were long and tapered. He respected them, although in some ways he didn't understand them.

Cole was deep in thought, meditating over his situation. He had been in the mountains two nights and a day. The first night had been the worst. Stumbling and falling, making his way uncertainly up the steep slopes, through the tangled brush and undergrowth—

But when the sun came up he was safe, deep in the mountains, between two great peaks. And by the time the sun had set again he had fixed himself up a shelter and a means of making a fire. Now he had a neat little box trap, operated by a plaited grass rope and pit, a notched stake. One rabbit already hung by his hind legs and the trap was waiting for another.

The sky turned from violet gray to a deep cold gray, a metallic color. The mountains were silent and empty. Far off some place a bird sang, its voice echoing across the vast slopes and ravines. Other birds began to sing. Off to his right something crashed through the brush, an animal pushing its way along.

Day was coming. His second day. Cole got to his feet and began to unfasten the rabbit. Time to eat. And then? After that he had no plans. He knew instinctively that he could keep himself alive indefinitely with the tools he had retained, and the genius of his hands. He could kill game and skin it. Eventually he could build him-

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

self a permanent shelter, even make clothes out of hides. In winter—

But he was not thinking that far ahead. Cole stood by the fire, staring up at the sky, his hands on his hips. He squinted, suddenly tense. Something was moving. Something in the sky, drifting slowly through the grayness. A black dot.

He stamped out the fire quickly. What was it? He strained, trying to see. A bird?

A second dot joined the first. Two dots. Then three. Four. Five. A fleet of them, moving rapidly across the early morning sky. Toward the mountains.

Toward him.

Cole hurried away from the fire. He snatched up the rabbit and carried it along with him, into the tangled shelter he had built. He was invisible, inside the shelter. No one could find him. But if they had seen the fire—

He crouched in the shelter, watching the dots grow larger. They were planes, all right. Black wingless planes, coming closer each moment. Now he could hear them, a faint dull buzz, increasing until the ground shook under him.

The first plane dived. It dropped like a stone, swelling into a great black shape. Cole gasped, sinking down. The plane roared in an arc, swooping low over the ground. Suddenly bundles tumbled out, white bundles falling and scattering like seeds.

The bundles drifted rapidly to the ground. They landed. They were men. Men in uniform.

Now the second plane was diving. It roared overhead, releasing its load. More bundles tumbled out, filling the sky. The third plane dived, then the fourth. The air was thick with drifting bundles of white, a blanket of descending weed spores, settling to earth.

On the ground the soldiers were forming into groups. Their shouts carried to Cole, crouched in his shelter. Fear leaped through him. They were landing on all sides of him. He was cut off. The last two planes had dropped men behind him.

He got to his feet, pushing out of the shelter. Some of the soldiers had found the fire, the ashes and coals. One dropped down, feeling the coals with his hand. He waved to the others. They were circling all around, shouting and gesturing. One of them began to set up some kind of gun. Others were unrolling coils of tubing, locking a collection of strange pipes and machinery in place.

Cole ran. He rolled down a slope, sliding and falling. At the bottom he leaped to his feet and

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

plunged into the brush. Vines and leaves tore at his face, slashing and cutting him. He fell again, tangled in a mass of twisted shrubbery. He fought desperately, trying to free himself. If he could reach the knife in his pocket—

Voices. Footsteps. Men were behind him, running down the slope. Cole struggled frantically, gasping and twisting, trying to pull loose. He strained, breaking the vines, clawing at them with his hands.

A soldier dropped to his knee, leveling his gun. More soldiers arrived, bringing up their rifles and aiming.

Cole cried out. He closed his eyes, his body suddenly limp. He waited, his teeth locked together, sweat dripping down his neck, into his shirt, sagging against the mesh of vines and branches coiled around him.

Silence.

Cole opened his eyes slowly. The soldiers had regrouped. A huge man was striding down the slope toward them, barking orders as he came.

Two soldiers stepped into the brush. One of them grabbed Cole by the shoulder.

"Don't let go of him." The huge man came over, his black beard jutting out. "Hold on."

Cole gasped for breath. He was caught. There was nothing he could do. More soldiers were pouring down into the gulley, surrounding him on all sides. They studied him curiouslf, murmuring together. Cole shook his head wearily and said nothing.

The huge man with the beard stood directly in front of him, his hands on his hips, looking him up and down. "Don't try to get away," the man said. "You can't get away. Do you understand?"

Cole nodded.

"All right. Good." The man waved. Soldiers clamped metal bands around Cole's arms and wrists. The metal dug into his flesh, making him gasp with pain. More clamps locked around his legs. "Those stay there until we're out of here. A long way out."

"Where—where are you taking me?"

Peter Sherikov studied the variable man for a moment before he answered. "Where? I'm taking you to my labs. Under the Urals." He glanced suddenly up at the sky. "We better hurry. The Security police will be starting their demolition attack in a few hours. We want to be a long way from here when that begins."

Sherikov settled down in his comfortable reinforced chair

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

with a sigh. "It's good to be back." He signalled to one of his guards. "All right. You can unfasten him."

The metal clamps were removed from Cole's arms and legs. He sagged, sinking down in a heap. Sherikov watched him silently.

Cole sat on the floor, rubbing his wrists and legs, saying nothing.

"What do you want? Sherikov demanded. "Food? Are you hungry?"

"No."

"Medicine? Are you sick? Injured?"

"No."

Sherikov wrinkled his nose. "A bath wouldn't hurt you any. We'll arrange that later." He lit a cigar, blowing a cloud of gray smoke around him. At the door of the room two lab guards stood with guns ready. No one else was in the room beside Sherikov and Cole.

Thomas Cole sat huddled in a heap on the floor, his head sunk down against his chest. He did not stir. His bent body seemed more elongated and stooped than ever, his hair tousled and unkempt, his chin and jowls a rough stubbled gray. His clothes were dirty and torn from crawling through the brush. His skin was cut and scratched; open sores dotted his neck and cheeks and forehead. He said nothing. His chest rose and fell. His faded blue eyes were almost closed. He looked quite old, a withered, dried-up old man.

Sherikov waved one of the guards over. "Have a doctor brought up here. I want this man checked over. He may need intravenous injections. He may not have had anything to eat for awhile."

The guard departed.

"I don't want anything to happen to you," Sherikov said. "Before we go on I'll have you checked over. And deloused at the same time."

Cole said nothing.

Sherikov laughed. "Buck up! You have no reason to feel bad." He leaned toward Cole, jabbing an immense finger at him. "Another two hours and you'd have been dead, out there in the mountains. You know that?"

Cole nodded.

"You don't believe me. Look." Sherikov leaned over and snapped on the vidscreen mounted in the wall. "Watch this. The operation should still be going on."

The screen lit up. A scene gained form.

"This is a confidential Security channel. I had it tapped several years ago—for my own protection. What we're seeing now is being piped in to Eric Reinhart." Sherikov grinned. "Reinhart ar-

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

ranged what you're seeing on the screen. Pay close attention. You were there, two hours ago."

Cole turned toward the screen. At first he could not make out what was happening. The screen showed a vast foaming cloud, a vortex of motion. From the speaker came a low rumble, a deep-throated roar. After a time the screen shifted, showing a slightly different view. Suddenly Cole stiffened.

He was seeing the destruction of a whole mountain range.

The picture was coming from a ship, flying above what had once been the Albertine Mountain Range. Now there was nothing but swirling clouds of gray and columns of particles and debris, a surging tide of restless material gradually sweeping off and dissipating in all directions.

The Albertine Mountains had been disintegrated. Nothing remained but these vast clouds of debris. Below, on the ground, a ragged plain stretched out, swept by fire and ruin. Gaping wounds yawned, immense holes without bottom, craters side by side as far as the eye could see. Craters and debris. Like the blasted, pitted surface of the moon. Two hours ago it had been rolling peaks and gulleys, brush and green bushes, and trees.

Cole turned away.

"You see?" Sherikov snapped the screen off. "You were down there, not so long ago. All that noise and smoke—all for you. All for you, Mr. Variable Man from the past. Reinhart arranged that, to finish you off. I want you to understand that. It's very important that you realize that."

Cole said nothing.

Sherikov reached into a drawer of the table before him. He carefully brought out a small square box and held it out to Cole. "You wired this, didn't you?"

Cole took the box in his hands and held it. For a time his tired mind failed to focus. What did he have? He concentrated on it. The box was the children's toy. The inter-system vidsender, they had called it.

"Yes. I fixed this." He passed it back to Sherikov. "I repaired that. It was broken."

Sherikov gazed down at him intently, his large eyes bright. He nodded, his black beard and cigar rising and falling. "Good. That's all I wanted to know." He got suddenly to his feet, pushing his chair back. "I see the doctor's here. He'll fix you up. Everything you need. Later on I'll talk to you again."

Unprotesting, Cole got to his feet, allowing the doctor to take hold of his arm and help him up.

After Cole had been released by the medical department,

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Sherikov joined him in his private dining room, a floor above the actual laboratory.

The Pole gulped down a hasty meal, talking as he ate. Cole sat silently across from him, not eating or speaking. His old clothing had been taken away and new clothing given him. He was shaved and rubbed down. His sores and cuts were healed, his body and hair washed. He looked much healthier and younger, now. But he was still stooped and tired, his blue eyes worn and faded. He listened to Sherikov's account of the world of 2136 AD without comment.

"You can see," Sherikov said finally, waving a chicken leg, "that your appearance here has been very upsetting to our program. Now that you know more about us you can see why Commissioner Reinhart was so interested in destroying you."

Cole nodded.

"Reinhart, you realize, believes that the failure of the SRB machines is the chief danger to the war effort. But that is nothing!" Sherikov pushed his plate away noisily, draining his coffee mug. "After all, wars *can* be fought without statistical forecasts. The SRB machines only describe. They're nothing more than mechanical onlookers. In themselves, they don't affect the course of the war. *We* make the war. They only analyze."

Cole noded.

"More coffee?" Sherikov asked. He pushed the plastic container toward Cole. "Have some."

Cole accepted another cupful. "Thank you."

"You can see that our real problem is another thing entirely. The machines only do figuring for us in a few minutes that eventually we could do for our own selves. They're our servants, tools. Not some sort of gods in a temple which we go and pray to. Not oracles who can see into the future for us. They don't see into the future. They only make statistical predictions—not prophecies. There's a big difference there, but Reinhart doesn't understand it. Reinhart and his kind have made such things as the SRB machines into gods. But I have no gods. At least, not any I can see."

Cole nodded, sipping his coffee.

"I'm telling you all these things because you must understand what we're up against. Terra is hemmed in on all sides by the ancient Centauran Empire. It's been out there for centuries, thousands of years. No one knows how long. It's old—crumbling and rotting. Corrupt

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

and venal. But it holds most of the galaxy around us, and we can't break out of the Sol system. I told you about Icarus, and Hedge's work in ftl flight. We must win the war against Centaurus. We've waited and worked a long time for this, the moment when we can break out and get room among the stars for ourselves. Icarus is the deciding weapon. The data on Icarus tipped the SRB odds in our favor—for the first time in history. Success in the war against Centaurus will depend on Icarus, not on the SRB machines. You see?"

Cole nodded.

"However, there is a problem. The data on Icarus which I turned over to the machines specified that Icarus would be completed in ten days. More than half that time has already passed. Yet, we are no closer to wiring up the control turret than we were then. The turret baffles us." Sherikov grinned ironically. "Even *I* have tried my hand at the wiring, but with no success. It's intricate—and small. Too many technical buts not worked out. We are building only one, you understand. If we had many experimental models worked out before—"

"But this is the experimental model," Cole said.

"And built from the designs of a man dead four years—who isn't here to correct us. We've made Icarus with our own hands, down here in the labs. And he's giving us plenty of trouble." All at once Sherikov got to his feet. "Let's go down to the lab and look at him."

They descended to the floor below, Sherikov leading the way. Cole stopped short at the lab door.

"Quite a sight," Sherikov agreed. "We keep him down here at the bottom for safety's sake. He's well protected. Come on in. We have work to do."

In the center of the lab Icarus rose up, the gray squat cylinder that someday would flash through space at a speed of thousands of times that of light, toward the heart of Proxima Centaurus, over four light years away. Around the cylinder groups of men in uniform were laboring feverishly to finish the remaining work.

"Over here. The turret." Sherikov led Cole over to one side of the room. "It's guarded. Centauran spies are swarming everywhere on Terra. They see into everything. But so do we. That's how we get information for the SRB machines. Spies in both systems."

The transluscent globe that was the control turret reposed in the center of a metal stand,

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

an armed guard standing at each side. They lowered their guns as Sherikov approached.

"We don't want anything to happen to this," Sherikov said. "Everything depends on it." He put out his hand for the globe. Half way to it his hand stopped, striking against an invisible presence in the air.

Sherikov laughed. "The wall. Shut it off. It's still on."

One of the guards pressed at stud at his wrist. Around the globe the air shimmered and faded.

"Now." Sherikov's hand closed over the globe. He lifted it carefully from its mount and brought it out for Cole to see. "This is the control turret for our enormous friend here. This is what will slow him down when he's inside Centaurus. He slows down and re-enters this universe. Right in the heart of the star. Then—no more Centaurus." Sherikov beamed. "And no more Armun."

But Cole was not listening. He had taken the globe from Sherikov and was turning it over and over, running his hands over it, his face close to its surface. He peered down into its interior, his face rapt and intent.

"You can't see the wiring. Not without lenses." Sherikov signalled for a pair of micro-lenses to be brought. He fitted them on Cole's nose, hooking them behind his ears. "Now try it. You can control the magnification. It's set for 1000X right now. You can increase or decrease it."

Cole gasped, swaying back and forth. Sherikov caught hold of him. Cole gazed down into the globe, moving his head slightly, focussing the glasses.

"It takes practice. But you can do a lot with them. Permits you to do microscopic wiring. There are tools to go along, you understand." Sherikov paused, licking his lip. "We can't get it done correctly. Only a few men can wire circuits using the micro-lenses and the little tools. We're tried robots, but there are too many decisions to be made. Robots can't make decisions. They just react."

Cole said nothing. He continued to gaze into the interior of the globe, his lips tight, his body taut and rigid. It made Sherikov feel strangely uneasy.

"You look like one of those old fortune tellers," Sherikov said jokingly, but a cold shiver crawled up his spine. "Better hand it back to me." He held out his hand.

Slowly, Cole returned the globe. After a time he removed the micro-lenses, still deep in thought.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

"Well?" Sherikov demanded. "You know what I want. I want you to wire this damn thing up." Sherikov came close to Cole, his big face hard. "You can do it, I think. I could tell by the way you held it—and the job you did on the children's toy, of course. You could wire it up right, and in five days. Nobody else can. And if it's not wired up Centaurus will keep on running the galaxy and Terra will have to sweat it out here in the Sol system. One tiny mediocre sun, one dust mote out of a whole galaxy."

Cole did not answer.

Sherikov became impatient. "Well? What do you say?"

"What happens if I don't wire this control for you? I mean, what happens to *me?*"

"Then I turn you over to Reinhart. Reinhart will kill you instantly. He thinks you're dead, killed when the Albertine Range was annihilated. If he had any idea I had saved you—"

"I see."

"I brought you down here for one thing. If you wire it up I'll have you sent back to your own time continuum. If you don't—"

Cole considered, his face dark and brooding.

"What do you have to lose? You'd already be dead, if we hadn't pulled you out of those hills."

"Can you really return me to my own time?"

"Of course!"

"Reinhart won't interfere?"

Sherikov laughed. "What can he do? How can he stop me? I have my own men. You saw them. They landed all around you. You'll be returned."

"Yes. I saw your men."

"Then you agree?"

"I agree," Thomas Cole said. "I'll wire it for you. I'll complete the control turret—within the next five days."

IV

Three days later Joseph Dixon slid a closed-circuit message plate across the desk to his boss.

"Here. You might be interested in this."

Reinhart picked the plate up slowly. "What is it? You came all the way here to show me this?"

"That's right."

"Why didn't you vidscreen it?"

Dixon smiled grimly. "You'll understand when you decode it. It's from Proxima Centaurus."

"Centaurus!"

"Our counter-intelligence service. They sent it direct to me. Here, I'll decode it for you. Save you the trouble."

Dixon came around behind Reinhart's desk. He leaned over

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

the Commissioner's shoulder, taking hold of the plate and breaking the seal with his thumb nail.

"Hang on," Dixon said. "This is going to hit you hard. According to our agents on Armun, the Centauran High Council has called an emergency session to deal with the problem of Terra's impending attack. Centauran relay couriers have reported to the High Council that the Terran bomb Icarus is virtually complete. Work on the bomb has been rushed through final stages in the underground laboratories under the Ural Range, directed by the Terran physicist Peter Sherikov."

"So I understand from Sherikov himself. Are you surprised the Centaurans know about the bomb? They have spies swarming over Terra. That's no news."

"There's more." Dixon traced the message plate grimly, with an unsteady finger. "The Centauran relay couriers reported that Peter Sherikov brought an expert mechanic out of a previous time continuum to complete the wiring of the turret!"

Reinhart staggered, holding on tight to the desk. He closed his eyes, gasping.

"The variable man is still alive," Dixon murmured. "I don't know how. Or why. There's nothing left of the Albertines. And how the hell did the man get half way around the world?"

Reinhart opened his eyes slowly, his face twisting. "Sherikov! He must have removed him before the attack. I told Sherikov the attack was forthcoming. I gave him the exact hour. He had to get help—from the variable man. He couldn't meet his promise otherwise."

Reinhart leaped up and began to pace back and forth. "I've already informed the SRB machines that the variable man has been destroyed. The machines now show the original 7-6 ratio in our favor. But the ratio is based on false information."

"Then you'll have to withdraw the false data and restore the original situation."

"No." Reinhart shook his head. "I can't do that. The machines must be kept functioning. We can't allow them to jam again. It's too dangerous. If Duffe should become aware that—"

"What are you going to do, then?" Dixon picked up the message plate. "You can't leave the machines with false data. That's treason."

"The data can't be withdrawn! Not unless equivalent data exists to take its place." Reinhart paced angrily back and forth. "Damn it, I was *certain*

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

the man was dead. This is an incredible situation. He must be eliminated—at any cost."

Suddenly Reinhart stopped pacing. "The turret. It's probably finished by this time. Correct?"

Dixon nodded slowly in agreement. "With the variable man helping, Sherikov has undoubtedly completed work well ahead of schedule."

Reinhart's gray eyes flickered. "Then he's no longer of any use—even to Sherikov. We could take a chance . . . Even if there were active opposition . . ."

"What's this?" Dixon demanded. "What are you thinking about?"

"How many units are ready for immediate action? How large a force can we raise without notice?"

"Because of the war we're mobilized on a twenty-four hour basis. There are seventy air units and about two hundred surface units. The balance of the Security forces have been transferred to the line, under military control."

"Men?"

"We have about five thousand men ready to go, still on Terra. Most of them in the process of being transferred to military transports. I can hold it up at any time."

"Missiles?"

"Fortunately, the launching tubes have not yet been disassembled. They're still here on Terra. In another few days they'll be moving out for the Colonial fracas."

"Then they're available for immediate use?"

"Yes."

"Good." Reinhart locked his hands, knotting his fingers harshly together in sudden decision. "That will do exactly. Unless I am completely wrong, Sherikov has only a half-dozen air units and no surface cars. And only about two hundred men. Some defense shields, of course—"

"What are you planning?"

Reinhart's face was gray and hard, like stone. "Send out orders for all available Security units to be unified under your immediate command. Have them ready to move by four o'clock this afternoon. We're going to pay a visit," Reinhart stated grimly. "A surprise visit. On Peter Sherikov."

"Stop here," Reinhart ordered.

The surface car slowed to a halt. Reinhart peered cautiously out, studying the horizon ahead.

On all sides a desert of scrub grass and sand stretched out. Nothing moved or stirred. To the right the grass and sand

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

rose up to form immense peaks, a range of mountains without end, disappearing finally into the distance. The Urals.

"Over there," Reinhart said to Dixon, pointing. "See?"

"No."

"Look hard. It's difficult to spot unless you know what to look for. Vertical pipes. Some kind of vent. Or periscopes.

Dixon saw them finally. "I would have driven past without noticing."

"It's well concealed. The main labs are a mile down. Under the range itself. It's virtually impregnable. Sherikov had it built years ago, to withstand any attack. From the air, by surface cars, bombs, missiles—"

"He must feel safe down there."

"No doubt." Reinhart gazed up at the sky. A few faint black dots could be seen, moving lazily about, in broad circles. "Those aren't ours, are they? I gave orders—"

"No. They're not ours. All our units are out of sight. Those belong to Sherikov. His patrol."

Reinhart relaxed. "Good." He reached over and flicked on the vidscreen over the board of the car. "This screen is shielded? It can't be traced?"

"There's no way they can spot it back to us. It's non-directional."

The screen glowed into life. Reinhart punched the combination keys and sat back to wait.

After a time an image formed on the screen. A heavy face, bushy black beard and large eyes.

Peter Sherikov gazed at Reinhart with surprised curiosity. "Commissioner! Where are you calling from? What—"

"How's the work progressing?" Reinhart broke in coldly. "Is Icarus almost complete?"

Sherikov beamed with expansive pride. "He's done, Commissioner. Two days ahead of time. Icarus is ready to be launched into space. I tried to call your office, but they told me—"

"I'm not at my office." Reinhart leaned toward the screen. "Open your entrance tunnel at the surface. You're about to receive visitors."

Sherikov blinked. "Visitors?"

"I'm coming down to see you. About Icarus. Have the tunnel opened for me at once."

"Exactly where are you, Commissioner?"

"On the surface."

Sherikov's eyes flickered. "Oh? But—"

"Open up!" Reinhart snapped. He glanced at his wristwatch. "I'll be at the entrance in five minutes. I expect to find it ready for me."

"Of course." Sherikov nodded

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

in bewilderment. "I'm always glad to see you, Commissioner. But I—"

"Five minutes, then." Reinhart cut the circuit. The screen died. He turned quickly to Dixon. "You stay up here, as we arranged. I'll go down with one company of police. You understand the necessity of exact timing on this?"

"We won't slip up. Everything's ready. All units are in their places."

"Good." Reinhart pushed the door open for him. "You join your directional staff. I'll proceed toward the tunnel entrance."

"Good luck." Dixon leaped out of the car, onto the sandy ground. A gust of dry air swirled into the car around Reinhart. "I'll see you later."

Reinhart slammed the door. He turned to the group of police crouched in the rear of the car, their guns held tightly. "Here we go," Reinhart murmured. "Hold on."

The car raced across the sandy ground, toward the tunnel entrance to Sherikov's underground fortress.

Sherikov met Reinhart at the bottom end of the tunnel, where the tunnel opened up onto the main floor of the lab.

The big Pole approached, his hand out, beaming with pride and satisfaction. "It's a pleasure to see you, Commissioner. This is an historic moment."

Reinhart got out of the car, with his group of armed Security police. "Calls for a celebration, doesn't it?" he said.

"That's a good idea! We're two days ahead, Commissioner. The SRB machines will be interested. The odds should change abruptly at the news."

"Let's go down to the lab. I want to see the control turret myself."

A shadow crossed Sherikov's face. "I'd rather not bother the workmen right now, Commissioner. They've been under a great load, trying to complete the turret in time. I believe they're putting a few last finishes on it at this moment."

"We can view them by vidscreen. I'm curious to see them at work. It must be difficult to wire such minute relays."

Sherikov shook his head. "Sorry, Commissioner. No vidscreen on them. I won't allow it. This is too important. Our whole future depends on it."

Reinhart snapped a signal to his company of police. "Put this man under arrest."

Sherikov blanched. His mouth fell open. The police moved quickly around him, their gun-tubes up, jabbing into him. He was searched rapidly, efficiently.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

His gun belt and concealed energy screen were yanked off.

"What's going on?" Sherikov demanded, some color returning to his face. "What are you doing?"

"You're under arrest for the duration of the war. You're relieved of all authority. From now on one of my men will operate Designs. When the war is over you'll be tried before the Council and President Duffe."

Sherikov shook his head, dazed. "I don't understand. What's this all about? Explain it to me, Commissioner. What's happened?"

Reinhart signalled to his police. "Get ready. We're going into the lab. We may have to shoot our way in. The variable man should be in the area of the bomb, working on the control turret."

Instantly Sherikov's face hardened. His black eyes glittered, alert and hostile.

Reinhart laughed harshly. "We received a counter-intelligence report from Centaurus. I'm surprised at you, Sherikov. You know the Centaurans are everywhere with their relay couriers. You should have known—"

Sherikov moved. Fast. All at once he broke away from the police, throwing his massive body against them. They fell, scattering. Sherikov ran—directly at the wall. The police fired wildly. Reinhart fumbled frantically for his gun tube, pulling it up.

Sherikov reached the wall, running head down, energy beams flashing around him. He struck against the wall—and vanished.

"Down!" Reinhart shouted. He dropped to his hands and knees. All around him his police dived for the floor. Reinhart cursed wildly, dragging himself quickly toward the door. They had to get out, and right away. Sherikov had escaped. A false wall, an energy barrier set to respond to his pressure. He had dashed through it to safety. He—

From all sides an inferno burst, a flaming roar of death surging over them, around them, on every side. The room was alive with blazing masses of destruction, bouncing from wall to wall. They were caught between four banks of power, all of them open to full discharge. A trap—a death trap.

Reinhart reached the hall gasping for breath. He leaped to his feet. A few Security police followed him. Behind them, in the flaming room, the rest of the company screamed and struggled, blasted out of exis-

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

tence by the leaping bursts of power.

Reinhart assembled his remaining men. Already, Sherikov's guards were forming. At one end of the corridor a snub-barreled robot gun was maneuvering into position. A siren wailed. Guards were running on all sides, hurrying to battle stations.

The robot gun opened fire. Part of the corridor exploded, bursting into fragments. Clouds of choking debris and particles swept around them. Reinhart and his police retreated, moving back along the corridor.

They reached a junction. A second robot gun was rumbling toward them, hurrying to get within range. Reinhart fired carefully, aiming at its delicate control. Abruptly the gun spun convulsively. It lashed against the wall, smashing itself into the unyielding metal. Then it collapsed in a heap, gears still whining and spinning.

"Come on." Reinhart moved away, crouching and running. He glanced at his watch. *Almost time.* A few more minutes. A group of lab guards appeared ahead of them. Reinhart fired. Behind him his police fired past him, violet shafts of energy catching the group of guards as they entered the corridor. The guards spilled apart, falling and twisting. Part of them settled into dust, drifting down the corridor. Reinhart made his way toward the lab, crouching and leaping, pushing past heaps of debris and remains, followed by his men. "Come on! Don't stop!"

Suddenly from around them the booming, enlarged voice of Sherikov thundered, magnified by rows of wall speakers along the corridor. Reinhart halted, glancing around.

"Reinhart! You haven't got a chance. You'll never get back to the surface. Throw down your guns and give up. You're surrounded on all sides. You're a mile under the surface."

Reinhart threw himself into motion, pushing into billowing clouds of particles drifting along the corridor. "Are you sure, Sherikov?" he grunted.

Sherikov laughed, his harsh, metallic peals rolling in waves against Reinhart's eardrums. "I don't want to have to kill you, Commissioner. You're vital to the war. I'm sorry you found out about the variable man. I admit we overlooked the Centauran espionage as a factor in this. But now that you know about him—"

Suddenly Sherikov's voice broke off. A deep rumble had shaken the floor, a lapping vi-

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

bration that shuddered through the corridor.

Reinhart sagged with relief. He peered through the clouds of debris, making out the figures on his watch. Right on time. Not a second late.

The first of the hydrogen missiles, launched from the Council buildings on the other side of the world, were beginning to arrive. The attack had begun.

At exactly six o'clock Joseph Dixon, standing on the surface four miles from the entrance tunnel, gave the sign to the waiting units.

The first job was to break down Sherikov's defense screens. The missiles had to penetrate without interference. At Dixon's signal a fleet of thirty Security ships dived from a height of ten miles, swooping above the mountains, directly over the underground laboratories. Within five minutes the defense screens had been smashed, and all the tower projectors leveled flat. Now the mountains were virtually unprotected.

"So far so good," Dixon murmured, as he watched from his secure position. The fleet of Security ships roared back, their work done. Across the face of the desert the police surface cars were crawling rapidly toward the entrance tunnel, snaking from side to side.

Meanwhile, Sherikov's counter-attack had begun to go into operation.

Guns mounted among the hills opened fire. Vast columns of flame burst up in the path of the advancing cars. The cars hesitated and retreated, as the plain was churned up by a howling vortex, a thundering chaos of explosions. Here and there a car vanished in a cloud of particles. A group of cars moving away suddenly scattered, caught up by a giant wind that lashed across them and swept them up into the air.

Dixon gave orders to have the cannon silenced. The police air arm again swept overhead, a sullen roar of jets that shook the ground below. The police ships divided expertly and hurtled down on the cannon protecting the hills.

The cannon forgot the surface cars and lifted their snouts to meet the attack. Again and again the airships came, rocking the mountains with titanic blasts.

The guns became silent. Their echoing boom diminished, died away reluctantly, as bombs took critical toll of them.

Dixon watched with satisfaction as the bombing came to an end. The airships rose in a thick

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

swarm, black gnats shooting up in triumph from a dead carcass. They hurried back as emergency anti-aircraft robot guns swung into position and saturated the sky with blazing puffs of energy.

Dixon checked his wristwatch. The missiles were already on the way from North America. Only a few minutes remained.

The surface cars, freed by the successful bombing, began to regroup for a new frontal attack. Again they crawled forward, across the burning plain, bearing down cautiously on the battered wall of mountains, heading toward the twisted wrecks that had been the ring of defense guns. Toward the entrance tunnel.

An occasional cannon fired feebly at them. The cars came grimly on. Now, in the hollows of the hills, Sherikov's troops were hurrying to the surface to meet the attack. The first car reached the shadow of the mountains . . .

A deafening hail of fire burst loose. Small robot guns appeared everywhere, needle barrels emerging from behind hidden screens, trees and shrubs, rocks, stones. The police cars were caught in a withering cross-fire, trapped at the base of the hills.

Down the slopes Sherikov's guards raced, toward the stalled cars. Clouds of heat rose up and boiled across the plain as the cars fired up at the running men. A robot gun dropped like a slug onto the plain and screamed toward the cars, firing as it came.

Dixon twisted nervously. Only a few minutes. Any time, now. He shaded his eyes and peered up at the sky. No sign of them yet. He wondered about Reinhart. No signal had come up from below. Clearly, Reinhart had run into trouble. No doubt there was desperate fighting going on in the maze of underground tunnels, the intricate web of passages that honeycombed the earth below the mountains.

In the air, Sherikov's few defense ships were taking on the police raiders. Outnumbered, the defense ships darted rapidly, wildly, putting up a futile fight.

Sherikov's guards streamed out onto the plain. Crouching and running, they advanced toward the stalled cars. The police airships screeched down at them, guns thundering.

Dixon held his breath. When the missiles arrived—

The first missile struck. A section of the mountain vanished, turned to smoke and foaming gasses. The wave of heat slapped Dixon across the face, spinning him around. Quickly he reentered his ship and took off,

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

shooting rapidly away from the scene. He glanced back. A second and third missile had arrived. Great gaping pits yawned among the mountains, vast sections missing like broken teeth. Now the missiles could penetrate to the underground laboratories below.

On the ground, the surface cars halted beyond the danger area, waiting for the missile attack to finish. When the eighth missile had struck, the cars again moved forward. No more missiles fell.

Dixon swung his ship around, heading back toward the scene. The laboratory was exposed. The top sections of it had been ripped open. The laboratory lay like a tin can, torn apart by mighty explosions, its first floors visible from the air. Men and cars were pouring down into it, fighting with the guards swarming to the surface.

Dixon watched intently. Sherikov's men were bringing up heavy guns, big robot artillery. But the police ships were diving again. Sherikov's defensive patrols had been cleaned from the sky. The police ships whined down, arcing over the exposed laboratory. Small bombs fell, whistling down, pin-pointing the artillery rising to the surface on the remaining lift stages.

Abruptly Dixon's vidscreen clicked. Dixon turned toward it.

Reinhart's features formed. "Call off the attack." His uniform was torn. A deep bloody gash crossed his cheek. He grinned sourly at Dixon, pushing his tangled hair back out of his face. "Quite a fight."

"Sherikov—"

"He's called off his guards. We've agreed to a truce. It's all over. No more needed." Reinhart gasped for breath, wiping grime and sweat from his neck. "Land your ship and come down here at once."

"The variable man?"

"That comes next," Reinhart said grimly. He adjusted his gun tube. "I want you down here, for that part. I want you to be in on the kill."

Reinhart turned away from the vidscreen. In the corner of the room Sherikov stood silently, saying nothing. "Well?" Reinhart barked. "Where is he? Where will I find him?"

Sherikov licked his lips nervously, glancing up at Reinhart. "Commissioner, are you sure—"

"The attack has been called off. Your labs are safe. So is your life. Now it's your turn to come through." Reinhart gripped his gun, moving toward Sherikov. *"Where is he?"*

For a moment Sherikov hesitated. Then slowly his huge body

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

sagged, defeated. He shook his head wearily. "All right. I'll show you where he is." His voice was hardly audible, a dry whisper. "Down this way. Come on."

Reinhart followed Sherikov out of the room, into the corridor. Police and guards were working rapidly, clearing the debris and ruins away, putting out the hydrogen fires that burned everywhere. "No tricks, Sherikov."

"No tricks." Sherikov nodded resignedly. "Thomas Cole is by himself. In a wing lab off the main rooms."

"Cole?"

"The variable man. That's his name." The Pole turned his massive head a little. "He has a name."

Reinhart waved his gun. "Hurry up. I don't want anything to go wrong. This is the part I came for."

"You must remember something, Commissioner."

"What is it?"

Sherikov stopped walking. "Commissioner, nothing must happen to the globe. The control turret. Everything depends on it, the war, our whole—"

"I know. Nothing will happen to the damn thing. Let's go."

"If it should get damaged—"

"I'm not after the globe. I'm interested only in—in Thomas Cole."

They came to the end of the corridor and stopped before a metal door. Sherikov nodded at the door. "In there."

Reinhart moved back. "Open the door."

"Open it yourself. I don't want to have anything to do with it."

Reinhart shrugged. He stepped up to the door. Holding his gun level he raised his hand, passing it in front of the eye circuit. Nothing happened.

Reinhart frowned. He pushed the door with his hand. The door slid open. Reinhart was looking into a small laboratory. He glimpsed a workbench, tools, heaps of equipment, measuring devices, and in the center of the bench the transparent globe, the control turret.

"Cole?" Reinhart advanced quickly into the room. He glanced around him, suddenly alarmed. "Where—"

The room was empty. Thomas Cole was gone.

When the first missile struck, Cole stopped work and sat listening.

Far off, a distant rumble rolled through the earth, shaking the floor under him. On the bench, tools and equipment danced up and down. A pair of pliers fell crashing to the floor. A box of screws tipped over, spilling its minute contents out.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Cole listened for a time. Presently he lifted the transparent globe from the bench. With carefully controlled hands he held the globe up, running his fingers gently over the surface, his faded blue eyes thoughtful. Then, after a time, he placed the globe back on the bench, in its mount.

The globe was finished. A faint glow of pride moved through the variable man. The globe was the finest job he had ever done.

The deep rumblings ceased. Cole became instantly alert. He jumped down from his stool, hurrying across the room to the door. For a moment he stood by the door listening intently. He could hear noise on the other side, shouts, guards rushing past, dragging heavy equipment, working frantically.

A rolling crash echoed down the corridor and lapped against his door. The concussion spun him around. Again a tide of energy shook the walls and floor and sent him down on his knees.

The lights flickered and winked out.

Cole fumbled in the dark until he found a flashlight. Power failure. He could hear crackling flames. Abruptly the lights came on again, an ugly yellow, then faded back out. Cole bent down and examined the door with his flashlight. A magnetic lock. Dependent on an externally induced electric flux. He grabbed a screwdriver and pried at the door. For a moment it held. Then it fell open.

Cole stepped warily out into the corridor. Everything was in shambles. Guards wandered everywhere, burned and half-blinded. Two lay groaning under a pile of wrecked equipment. Fused guns, reeking metal. The air was heavy with the smell of burning wiring and plastic. A thick cloud that choked him and made him bend double as he advanced.

"Halt," a guard gasped feebly, struggling to rise. Cole pushed past him and down the corridor. Two small robot guns, still functioning, glided past him hurriedly toward the drumming chaos of battle. He followed.

At a major intersection the fight was in full swing. Sherikov's guards fought Security police, crouched behind pillars and barricades, firing wildly, desperately. Again the whole structure shuddered as a great booming blast ignited some place above. Bombs? Shells?

Cole threw himself down as a violet beam cut past his ear and disintegrated the wall behind him. A Security policeman, wild-eyed, firing erratically. One of

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Sherikov's guards winged him and his gun skidded to the floor.

A robot cannon turned toward him as he made his way past the intersection. He began to run. The cannon rolled along behind him, aiming itself uncertainly. Cole hunched over as he shambled rapidly along, gasping for breath. In the flickering yellow light he saw a handful of Security police advancing, firing expertly, intent on a line of defense Sherikov's guards had hastily set up.

The robot cannon altered its course to take them on, and Cole escaped around a corner.

He was in the main lab, the big chamber where Icarus himself rose, the vast squat column.

Icarus! A solid wall of guards surrounded him, grim-faced, hugging guns and protection shields. But the Security police were leaving Icarus alone. Nobody wanted to damage him. Cole evaded a lone guard tracking him and reached the far side of the lab.

It took him only a few seconds to find the force field generator. There was no switch. For a moment that puzzled him—and then he remembered. The guard had controlled it from his wrist.

Too late to worry about that. With his screwdriver he unfastened the plate over the generator and ripped out the wiring in handfuls. The generator came loose and he dragged it away from the wall. The screen was off, thank God. He managed to carry the generator into a side corridor.

Crouched in a heap, Cole bent over the generator, deft fingers flying. He pulled the wiring to him and laid it out on the floor, tracing the circuits with feverish haste.

The adaptation was easier than he had expected. The screen flowed at right angles to the wiring, for a distance of six feet. Each lead was shielded on one side; the field radiated outward, leaving a hollow cone in the center. He ran the wiring through his belt, down his trouser legs, under his shirt, all the way to his wrists and ankles.

He was just snatching up the heavy generator when two Security police appeared. They raised their blasters and fired point-blank.

Cole clicked on the screen. A vibration leaped through him that snapped his jaw and danced up his body. He staggered away, half-stupefied by the surging force that radiated out from him. The violet rays struck the field and deflected harmlessly.

He was safe.

He hurried on down the corri-

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

dor, past a ruined gun and sprawled bodies still clutching blasters. Great drifting clouds of radioactive particles billowed around him. He edged by one cloud nervously. Guards lay everywhere, dying and dead, partly destroyed, eaten and corroded by the hot metallic salts in the air. He had to get out—and fast.

At the end of the corridor a whole section of the fortress was in ruins. Towering flames leaped on all sides. One of the missiles had penetrated below ground level.

Cole found a lift that still functioned. A load of wounded guards was being raised to the surface. None of them paid any attention to him. Flames surged around the lift, licking at the wounded. Workmen were desperately trying to get the lift into action. Cole leaped onto the lift. A moment later it began to rise, leaving the shouts and the flames behind.

The lift emerged on the surface and Cole jumped off. A guard spotted him and gave chase. Crouching, Cole dodged into a tangled mass of twisted metal, still white-hot and smoking. He ran for a distance, leaping from the side of a ruined defense-screen tower, onto the fused ground and down the side of a hill. The ground was hot underfoot. He hurried as fast as he could, gasping for breath. He came to a long slope and scrambled up the side.

The guard who had followed was gone, lost behind in the rolling clouds of ash that drifted from the ruins of Sherikov's underground fortress.

Cole reached the top of the hill. For a brief moment he halted to get his breath and figure where he was. It was almost evening. The sun was beginning to set. In the darkening sky a few dots still twisted and rolled, black specks that abruptly burst into flame and fused out again.

Cole stood up cautiously, peering around him. Ruins stretched out below, on all sides, the furnace from which he had escaped. A chaos of incandescent metal and debris, gutted and wrecked beyond repair. Miles of tangled rubbish and half-vaporized equipment.

He considered. Everyone was busy putting out the fires and pulling the wounded to safety. It would be awhile before he was missed. But as soon as they realized he was gone they'd be after him. Most of the laboratory had been destroyed. Nothing lay back that way.

Beyond the ruins lay the great Ural peaks, the endless mountains, stretching out as far as the eye could see.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Mountains and green forests. A wilderness. They'd never find him there.

Cole started along the side of the hill, walking slowly and carefully, his screen generator under his arm. Probably in the confusion he could find enough food and equipment to last him indefinitely. He could wait until early morning, then circle back toward the ruins and load up. With a few tools and his own innate skill he would get along fine. A screwdriver, hammer, nails, odds and ends—

A great hum sounded in his ears. It swelled to a deafening roar. Startled, Cole whirled around. A vast shape filled the sky behind him, growing each moment. Cole stood frozen, utterly transfixed. The shape thundered over him, above his head, as he stood stupidly, rooted to the spot.

Then, awkwardly, uncertainly, he began to run. He stumbled and fell and rolled a short distance down the side of the hill. Desperately, he struggled to hold onto the ground. His hands dug wildly, futilely, into the soft soil, trying to keep the generator under his arm at the same time.

A flash, and a blinding spark of light around him.

The spark picked him up and tossed him like a dry leaf. He grunted in agony as searing fire crackled about him, a blazing inferno that gnawed and ate hungrily through his screen. He spun dizzily and fell through the cloud of fire, down into a pit of darkness, a vast gulf between two hills. His wiring ripped off. The generator tore out of his grip and was lost behind. Abruptly, his force field ceased.

Cole lay in the darkness at the bottom of the hill. His whole body shrieked in agony as the unholy fire played over him. He was a blazing cinder, a half-consumed ash flaming in a universe of darkness. The pain made him twist and crawl like an insect, trying to burrow into the ground. He screamed and shrieked and struggled to escape, to get away from the hideous fire. To reach the curtain of darkness beyond, where it was cool and silent, where the flames couldn't crackle and eat at him.

He reached imploringly out, into the darkness, groping feebly toward it, trying to pull himself into it. Gradually, the glowing orb that was his own body faded. The impenetrable chaos of night descended. He allowed the tide to sweep over him, to extinguish the searing fire.

Dixon landed his ship expertly, bringing it to a halt in front of an overturned defense tower.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

He leaped out and hurried across the smoking ground.

From a lift Reinhart appeared, surrounded by his Security police. "He got away from us! He escaped!"

"He didn't escape," Dixon answered. "I got him myself."

Reinhart quivered violently. "What do you mean?"

"Come along with me. Over in this direction." He and Reinhart climbed the side of a demolished hill, both of them panting for breath. "I was landing. I saw a figure emerge from a lift and run toward the mountains, like some sort of animal. When he came out in the open I dived on him and released a phosphorus bomb."

"Then he's—*dead?*"

"I don't see how anyone could have lived through a phosphorus bomb." They reached the top of the hill. Dixon halted, then pointed excitedly down into the pit beyond the hill. "There!"

They descended cautiously. The ground was singed and burned clean. Clouds of smoke hung heavily in the air. Occasional fires still flickered here and there. Reinhart coughed and bent over to see. Dixon flashed on a pocket flare and set it beside the body.

The body was charred, half destroyed by the burning phosphorus. It lay motionless, one arm over its face, mouth open, legs sprawled grotesquely. Like some abandoned rag doll, tossed in an incinerator and consumed almost beyond recognition.

"He's alive!" Dixon muttered. He felt around curiously. "Must have had some kind of protection screen. Amazing that a man could—"

"It's him? It's really him?"

"Fits the description." Dixon tore away a handful of burned clothing. "This is the variable man. What's left of him, at least."

Reinhart sagged with relief. "Then we've finally got him. The data is accurate. He's no longer a factor."

Dixon got out his blaster and released the safety catch thoughtfully. "If you want, I can finish the job right now."

At that moment Sherikov appeared, accompanied by two armed Security police. He strode grimly down the hillside, black eyes snapping. "Did Cole—" He broke off. "Good God."

"Dixon got him with a phosphorus bomb," Reinhart said noncommittally. "He had reached the surface and was trying to get into the mountains"

Sherikov turned wearily away. "He was an amazing person. During the attack he managed to force the lock on his door

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

and escape. The guards fired at him, but nothing happened. He had rigged up some kind of force field around him. Something he adapted."

"Anyhow, it's over with," Reinhart answered. "Did you have SRB plates made up on him?"

Sherikov reached slowly into his coat. He drew out a manila envelope. "Here's all the information I collected about him, while he was with me."

"Is it complete? Everything previous has been merely fragmentary."

"As near complete as I could make it. It includes photographs and diagrams of the interior of the globe. The turret wiring he did for me. I haven't had a chance even to look at them." Sherikov fingered the envelope. "What are you going to do with Cole?"

"Have him loaded up, taken back to the city—and officially put to sleep by the Euthanasia Ministry."

"Legal murder?" Sherikov's lips twisted. "Why don't you simply do it right here and get it over with?"

Reinhart grabbed the envelope and stuck it in his pocket. "I'll turn this right over to the machines." He motioned to Dixon. "Let's go. Now we can notify the fleet to prepare for the attack on Centaurus." He turned briefly back to Sherikov. "When can Icarus be launched?"

"In an hour or so, I suppose. They're locking the control turret in place. Assuming it functions correctly, that's all that's needed."

"Good. I'll notify Duffe to send out the signal to the warfleet." Reinhart nodded to the police to take Sherikov to the waiting Security ship. Sherikov moved off dully, his face gray and haggard. Cole's inert body was picked up and tossed onto a freight cart. The cart rumbled into the hold of the Security ship and the lock slid shut after it.

"It'll be interesting to see how the machines respond to the additional data," Dixon said.

"It should make quite an improvement in the odds," Reinhart agreed. He patted the envelope, bulging in his inside pocket. "We're two days ahead of time."

Margaret Duffe got up slowly from her desk. She pushed her chair automatically back. "Let me get all this straight. You mean the bomb is finished? Ready to go?"

Reinhart nodded impatiently. "That's what I said. The Technicians are checking the turret locks to make sure it's properly

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

attached. The launching will take place in half an hour."

"Thirty minutes! Then—"

"Then the attack can begin at once. I assume the fleet is ready for action."

"Of course. It's been ready for several days. But I can't believe the bomb is ready so soon." Margaret Duffe moved numbly toward the door of her office. "This is a great day, Commissioner. An old era lies behind us. This time tomorrow Centaurus will be gone. And eventually the colonies will be ours."

"It's been a long climb," Reinhart murmured.

"One thing. Your charge against Sherikov. It seems incredible that a person of his caliber could ever—"

"We'll discuss that later," Reinhart interrupted coldly. He pulled the manila envelope from his coat. "I haven't had an opportunity to feed the additional data to the SRB machines. If you'll excuse me, I'll do that now."

For a moment Margaret Duffe stood at the door. The two of them faced each other silently, neither speaking, a faint smile on Reinhart's thin lips, hostility in the woman's blue eyes.

"Reinhart, sometimes I think perhaps you'll go too far. And sometimes I think you've *already* gone too far. . . ."

"I'll inform you of any change in the odds showing." Reinhart strode past her, out of the office and down the hall. He headed toward the SRB room, an intense thalamic excitement rising up inside him.

A few moments later he entered the SRB room. He made his way to the machines. The odds 7-6 showed in the view windows. Reinhart smiled a little. 7-6. False odds, based on incorrect information. Now they could be removed.

Kaplan hurried over. Reinhart handed him the envelope, and moved over to the window, gazing down at the scene below. Men and cars scurried frantically everywhere. Officials coming and going like ants, hurrying in all directions.

The war was on. The signal had been sent out to the warfleet that had waited so long near Proxima Centaurus. A feeling of triumph raced through Reinhart. He had won. He had destroyed the man from the past and broken Peter Sherikov. The war had begun as planned. Terra was breaking out. Reinhart smiled thinly. He had been completely successful.

"Commissioner."

Reinhart turned slowly. "All right."

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Kaplan was standing in front of the machines, gazing down at the reading. "Commissioner—"

Sudden alarm plucked at Reinhart. There was something in Kaplan's voice. He hurried quickly over. "What is it?"

Kaplan looked up at him, his face white, his eyes wide with terror. His mouth opened and closed, but no sound came.

"*What is it?*" Reinhart demanded, chilled. He bent toward the machines, studying the reading.

And sickened with horror.

100-1. *Against* Terra!

He could not tear his gaze away from the figures. He was numb, shocked with disbelief. 100-1. *What had happened?* What had gone wrong? The turret was finished, Icarus was ready, the fleet had been notified—

There was a sudden deep buzz from outside the building. Shouts drifted up from below. Reinhart turned his head slowly toward the window, his heart frozen with fear.

Across the evening sky a trail moved, rising each moment. A thin line of white. Something climbed, gaining speed each moment. On the ground, all eyes were turned toward it, awed faces peering up.

The object gained speed. Faster and faster. Then it vanished. Icarus was on his way. The attack had begun; it was too late to stop, now.

And on the machines the odds read a hundred to one—for failure.

At eight o'clock in the evening of May 15, 2136, Icarus was launched toward the star Centaurus. A day later, while all Terra waited, Icarus entered the star, traveling at thousands of times the speed of light.

Nothing happened. Icarus disappeared into the star. There was no explosion. The bomb failed to go off.

At the same time the Terran warfleet engaged the Centauran outer fleet, sweeping down in a concentrated attack. Twenty major ships were seized. A good part of the Centauran fleet was destroyed. Many of the captive systems began to revolt, in the hope of throwing off the Imperial bonds.

Two hours later the massed Centauran warfleet from Armun abruptly appeared and joined battle. The great struggle illuminated half the Centauran system. Ship after ship flashed briefly and then faded to ash. For a whole day the two fleets fought, strung out over millions of miles of space. Innumerable fighting men died—on both sides.

At last the remains of the battered Terran fleet turned and

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

limped toward Armun — defeated. Little of the once impressive armada remained. A few blackened hulks, making their way uncertainly toward captivity.

Icarus had not functioned. Centaurus had not exploded. The attack was a failure.

The war was over.

"We've lost the war," Margaret Duffe said in a small voice, wondering and awed. "It's over. Finished."

The Council members sat in their places around the conference table, gray-haired elderly men, none of them speaking or moving. All gazed up mutely at the great stellar maps that covered two walls of the chamber.

"I have already empowered negotiators to arrange a truce," Margaret Duffe murmured. "Orders have been sent out to Vice-Commander Jessup to give up the battle. There's no hope. Fleet Commander Carleton destroyed himself and his flagship a few minutes ago. The Centauran High Council has agreed to end the fighting. Their whole Empire is rotten to the core. Ready to topple of its own weight."

Reinhart was slumped over at the table, his head in his hands. "I don't understand . . . *Why?* Why didn't the bomb explode?" He mopped his forehead shakily. All his poise was gone. He was trembling and broken. "*What went wrong?*"

Gray-faced, Dixon mumbled an answer. "The variable man must have sabotaged the turret. The SRB machines knew. . . . They analyzed the data. *They knew!* But it was too late."

Reinhart's eyes were bleak with despair as he raised his head a little. "I knew he'd destroy us. We're finished. A century of work and planning." His body knotted in a spasm of furious agony. "All because of Sherikov!"

Margaret Duffe eyed Reinhart coldly. "Why because of Sherikov?"

"He kept Cole alive! I wanted him killed from the start." Suddenly Reinhart jumped from his chair. His hand clutched convulsively at his gun. "And he's *still* alive! Even if we've lost I'm going to have the pleasure of putting a blast beam through Cole's chest!"

"Sit down!" Margaret Duffe ordered.

Reinhart was half way to the door. "He's still at the Euthanasia Ministry, waiting for the official—"

"No, he's not," Margaret Duffe said.

Reinhart froze. He turned

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

slowly, as if unable to believe his senses. *"What?"*

"Cole isn't at the Ministry. I ordered him transferred and your instructions cancelled."

"Where—where is he?"

There was unusual hardness in Margaret Duffe's voice as she answered. "With Peter Sherikov. In the Urals. I had Sherikov's full authority restored. I then had Cole transferred there, put in Sherikov's safe keeping. I want to make sure Cole recovers, so we can keep our promise to him—our promise to return him to his own time."

Reinhart's mouth opened and closed. All the color had drained from his face. His cheek muscles twiched spasmodically. At last he managed to speak. "You've gone insane! The traitor responsible for Earth's greatest defeat—"

"We have lost the war," Margaret Duffe stated quietly. "But this is not a day of defeat. It is a day of victory. The most incredible victory Terra has ever had."

Reinhart and Dixon were dumbfounded. "What—" Reinhart gasped. "What do you—" The whole room was in an uproar. All the Council members were on their feet. Reinhart's words were drowned out.

"Sherikov will explain when he gets here," Margaret Duffe's calm voice came. "He's the one who discovered it." She looked around the chamber at the incredulous Council members. "Everyone stay in his seat. You are all to remain here until Sherikov arrives. It's vital you hear what he has to say. His news transforms this whole situation."

Peter Sherikov accepted the briefcase of papers from his armed technician. "Thanks." He pushed his chair back and glanced thoughtfully around the Council chamber. "Is everybody ready to hear what I have to say?"

"We're ready," Margaret Duffe answered. The Council members sat alertly around the table. At the far end, Reinhart and Dixon watched uneasily as the big Pole removed papers from his briefcase and carefully examined them.

"To begin, I recall to you the original work behind the ftl bomb. Jamison Hedge was the first human to propel an object at a speed greater than light. As you know, that object diminished in length and gained in mass as it moved toward light speed. When it reached that speed it vanished. It ceased to exist in our terms. Having no length it could not occupy space. It rose to a different order of existence.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

"When Hedge tried to bring the object back, an explosion occurred. Hedge was killed, and all his equipment was destroyed. The force of the blast was beyond calculation. Hedge had placed his observation ship many millions of miles away. It was not far enough, however. Originally, he had hoped his drive might be used for space travel. But after his death the principle was abandoned.

"That is—until Icarus. I saw the possibilities of a bomb, an incredibly powerful bomb to destroy Centaurus and all the Empire's forces. The reappearance of Icarus would mean the annihilation of their System. As Hedge had shown, the object would re-enter space already occupied by matter, and the cataclysm would be beyond belief."

"But Icarus never came back," Reinhart cried. "Cole altered the wiring so the bomb kept on going. It's probably still going."

"Wrong," Sherikov boomed. "The bomb *did* reappear. But it didn't explode."

Reinhart reacted violently. "You mean—"

"The bomb came back, dropping below the ftl speed as soon as it entered the star Proxima. But it did not explode. There was no cataclysm. It reappeared and was absorbed by the sun, turned into gas at once."

"Why didn't it explode?" Dixon demanded.

"Because Thomas Cole solved Hedge's problem. He found a way to bring the ftl object back into this universe without collision. Without an explosion. The variable man found what Hedge was after. . . ."

The whole Council was on its feet. A growing murmur filled the chamber, a rising pandemonium breaking out on all sides.

"I don't believe it!" Reinhart gasped. "It isn't possible. If Cole solved Hedge's problem that would mean—" He broke off, staggered.

"Faster than light drive can now be used for space travel," Sherikov continued, waving the noise down. "As Hedge intended. My men have studied the photographs of the control turret. They don't know *how* or *why*, yet. But we have complete records of the turret. We can duplicate the wiring, as soon as the laboratories have been repaired."

Comprehension was gradually beginning to settle over the room. "Then it'll be possible to build ftl ships," Margaret Duffe murmured, dazed. "And if we can do that—"

"When I showed him the control turret, Cole understood its purpose. Not *my* purpose, but

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

the original purpose Hedge had been working toward. Cole realized Icarus was actually an incomplete spaceship, not a bomb at all. He saw what Hedge had seen, an ftl space drive. He set out to make Icarus work."

"We can go *beyond* Centaurus," Dixon muttered. His lips twisted. "Then the war was trivial. We can leave the Empire completely behind. We can go beyond the galaxy."

"The whole universe is open to us," Sherikov agreed. "Instead of taking over an antiquated Empire, we have the entire cosmos to map and explore, God's total creation."

Margaret Duffe got to her feet and moved slowly toward the great stellar maps that towered above them at the far end of the chamber. She stood for a long time, gazing up at the myriad suns, the legions of systems, awed by what she saw.

"Do you suppose he realized all this?" she asked suddenly. "What we can see, here on these maps?"

"Thomas Cole is a strange person," Sherikov said, half to himself. Apparently he has a kind of intuition about machines, the way things are supposed to work. An intuition more in his hands than in his head. A kind of genius, such as a painter or a pianist has. Not a scientist. He has no verbal knowledge about things, no semantic references. He deals with the things themselves. Directly.

"I doubt very much if Thomas Cole understood what would come about. He looked into the globe, the control turret. He saw unfinished wiring and relays. He saw a job half done. An incomplete machine."

"Something to be fixed," Margaret Duffe put in.

"Something to be fixed. Like an artist, he saw his work ahead of him. He was interested in only one thing: turning out the best job he could, with the skill he possessed. For us, that skill has opened up a whole universe, endless galaxies and systems to explore. Worlds without end. Unlimited, *untouched* worlds."

Reinhart got unsteadily to his feet. "We better get to work. Start organizing construction teams. Exploration crews. We'll have to reconvert from war production to ship designing. Begin the manufacture of mining and scientific instruments for survey work."

"That's right," Margaret Duffe said. She looked reflectively up at him. "But you're not going to have anything to do with it."

Reinhart saw the expression on her face. His hand flew to his gun and he backed quickly

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

toward the door. Dixon leaped up and joined him. "Get back!" Reinhart shouted.

Margaret Duffe signalled and a phalanx of Government troops closed in around the two men. Grim-faced, efficient soldiers with magnetic grapples ready.

Reinhart's blaster wavered—toward the Council members sitting shocked in their seats, and toward Margaret Duffe, straight at her blue eyes. Reinhart's features were distorted with insane fear. "Get back! Don't anybody come near me or she'll be the first to get it!"

Peter Sherikov slid from the table and with one great stride swept his immense bulk in front of Reinhart. His huge black-furred fist rose in a smashing arc. Reinhart sailed against the wall, struck with ringing force and then slid slowly to the floor.

The Government troops threw their grapples quickly around him and jerked him to his feet. His body was frozen rigid. Blood dripped from his mouth. He spat bits of tooth, his eyes glazed over. Dixon stood dazed, mouth open, uncomprehending, as the grapples closed around his arms and legs.

Reinhart's gun skidded to the floor as he was yanked toward the door. One of the elderly Council members picked the gun up and examined it curiously. He laid it carefully on the table. "Fully loaded," he murmured. "Ready to fire."

Reinhart's battered face was dark with hate. "I should have killed all of you. *All* of you!" An ugly sneer twisted across his shredded lips. "If I could get my hands loose—"

"You won't," Margaret Duffe said. "You might as well not even bother to think about it." She signalled to the troops and they pulled Reinhart and Dixon roughly out of the room, two dazed figures, snarling and resentful.

For a moment the room was silent. Then the Council members shuffled nervously in their seats, beginning to breathe again.

Sherikov came over and put his big paw on Margaret Duffe's shoulder. "Are you all right, Margaret?"

She smiled faintly. "I'm fine. Thanks. . . ."

Sherikov touched her soft hair briefly. Then he broke away and began to pack up his briefcase busily. "I have to go. I'll get in touch with you later."

"Where are you going?" she asked hesitantly. "Can't you stay and—"

"I have to get back to the Urals." Sherikov grinned at her over his bushy black beard as he headed out of the room.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

"Some very important business to attend to."

Thomas Cole was sitting up in bed when Sherikov came to the door. Most of his awkward, hunched-over body was sealed in a thin envelope of transparent airproof plastic. Two robot attendants whirred ceaselessly at his side, their leads contacting his pulse, blood-pressure, respiration, body temperature.

Cole turned a little as the huge Pole tossed down his briefcase and seated himself on the window ledge.

"How are you feeling?" Sherikov asked him.

"Better."

"You see we've quite advanced therapy. Your burns should be healed in a few months."

"How is the war coming?"

"The war is over."

Cole's lips moved. "Icarus—"

"Icarus went as expected. As *you* expected." Sherikov leaned toward the bed. "Cole, I promised you something. I mean to keep my promise—as soon as you're well enough."

"To return me to my own time?"

"That's right. It's a relatively simple matter, now that Reinhart has been removed from power. You'll be back home again, back in your own time, your own world. We can supply you with some discs of platinum or something of the kind to finance your business. You'll need a new Fixit truck. Tools. And clothes. A few thousand dollars ought to do it."

Cole was silent.

"I've already contacted histo-research," Sherikov continued. "The time bubble is ready as soon as you are. We're somewhat beholden to you, as you probably realize. You've made it possible for us to actualize our greatest dream. The whole planet is seething with excitement. We're changing our economy over from war to—"

"They don't resent what happened? The dud must have made an awful lot of people feel downright bad."

"At first. But they got over it—as soon as they understood what was ahead. Too bad you won't be here to see it, Cole. A whole world breaking loose. Bursting out into the universe. They want me to have an ftl ship ready by the end of the week! Thousands of applications are already on file, men and women wanting to get in on the initial flight."

Cole smiled a little. "There won't be any band, there. No parade or welcoming committee waiting for them."

"Maybe not. Maybe the first ship will wind up on some dead

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

world, nothing but sand and dried salt. But everybody wants to go. It's almost like a holiday. People running around and shouting and throwing things in the streets.

"Afraid I must get back to the labs. Lots of reconstruction work being started." Sherikov dug into his bulging briefcase. "By the way . . . One little thing. While you're recovering here, you might like to look at these." He tossed a handful of schematics on the bed.

Cole picked them up slowly. "What's this?"

"Just a little thing I designed." Sherikov arose and lumbered toward the door. "We're realigning our political structure to eliminate any recurrence of the Reinhart affair. This will block any more one-man power grabs." He jabbed a thick finger at the schematics. "It'll turn power over to all of us, not to just a limited number one person could dominate—the way Reinhart dominated the Council.

"This gimmick makes it possible for citizens to raise and decide issues directly. They won't have to wait for the Council to verbalize a measure. Any citizen can transmit his will with one of these, make his needs register on a central control that automatically responds. When a large enough segment of the population wants a certain thing done, these little gadgets set up an active field that touches all the others. An issue won't have to go through a formal Council. The citizens can express their will long before any bunch of gray-haired old men could get around to it."

Sherikov broke off, frowning. "Of course," he continued slowly, "there's one little detail . . ."

"What's that?"

"I haven't been able to get a model to function. A few bugs . . . Such intricate work never was in my line." He paused at the door. "Well, I hope I'll see you again before you go. Maybe if you feel well enough later on we could get together for one last talk. Maybe have dinner together sometime. Eh?"

But Thomas Cole wasn't listening. He was bent over the schematics, an intense frown on his weathered face. His long fingers moved restlessly over the schematics, tracing wiring and terminals. His lips moved as he calculated.

Sherikov waited a moment. Then he stepped out into the hall and softly closed the door after him.

He whistled merrily as he strode off down the corridor.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

THE HOUR OF BATTLE

BY ROBERT SHECKLEY

ILLUSTRATED BY KRENKEL

As one of the Guardian ships protecting Earth, the crew had a problem to solve. Just how do you protect a race from an enemy who can take over a man's mind without seeming effort or warning?

"That hand didn't move, did it?" Edwardson asked, standing at the port, looking at the stars.

"No," Morse said. He had been staring fixedly at the Attison Detector for over an hour. Now he blinked three times rapidly, and looked again. "Not a millimeter."

"I don't think it moved either," Cassel added, from behind the gunfire panel. And that was that. The slender black hand of the indicator rested unwaveringly on zero. The ship's guns were ready, their black mouths open to the stars. A steady hum filled the room. It came from the Attison Detector, and the sound was reassuring. It reinforced the fact that the Detector was attached to all the other Detectors, forming a gigantic network around Earth.

"Why in hell don't they come?" Edwardson asked, still looking at the stars. "Why don't they hit?"

"Aah, shut up," Morse said. He had a tired, glum look. High on his right temple was an old radiation burn, a sunburst of pink scar tissue. From a distance it looked like a decoration.

"I just wish they'd come," Edwardson said. He returned from the port to his chair, bending to clear the low metal ceiling. "Don't you wish they'd come?" Edwardson had the narrow, timid face of a mouse; but

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

a highly intelligent mouse. One that cats did well to avoid.

"Don't you?" he repeated.

The other men didn't answer. They had settled back to their dreams, staring hypnotically at the Detector face.

"They've had enough time," Edwardson said, half to himself.

Cassel yawned and licked his lips. "Anyone want to play some gin?" he asked, stroking his beard. The beard was a memento of his undergraduate days. Cassel maintained he could store almost fifteen minutes worth of oxygen in its follicles. He had never stepped into space unhelmeted to prove it.

Morse looked away, and Edwardson automatically watched the indicator. This routine had been drilled into them, branded into their subconscious. They would as soon have cut their throats as leave the indicator unguarded.

"Do you think they'll come soon?" Edwardson asked, his brown rodent's eyes on the indicator. The men didn't answer him. After two months together in space their conversational powers were exhausted. They weren't interested in Cassel's undergraduate days, or in Morse's conquests.

They were bored to death even with their own thoughts and dreams, bored with the attack they expected momentarily.

"Just one thing *I'd* like to know," Edwardson said, slipping with ease into an old conversational gambit. "How far can they do it?"

They had talked for weeks about the enemy's telepathic range, but they always returned to it.

As professional soldiers, they couldn't help but speculate on the enemy and his weapons. It was their shop talk.

"Well," Morse said wearily, "Our Detector network covers the system out beyond Mars' orbit."

"Where we sit," Cassel said, watching the indicators now that the others were talking.

"They might not even know we have a detection unit working," Morse said, as he had said a thousand times.

"Oh, stop," Edwardson said, his thin face twisted in scorn. "They're telepathic. They must have read every bit of stuff in Everset's mind."

"Everset didn't know we had a detection unit," Morse said, his eyes returning to the dial. "He was captured before we had it."

"Look," Edwardson said, "They ask him, 'Boy, what would you do if you knew a telepathic race was coming to take

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

over Earth? How would you guard the planet?'"

"Idle speculation," Cassel said. "Maybe Everset didn't think of this."

"He thinks like a man, doesn't he? Everyone agreed on this defense. Everset would, too."

"Sillogistic," Cassel murmured. "Very shaky."

"I sure wish he hadn't been captured," Edwardson said.

"It could have been worse," Morse put in, his face sadder than ever. "What if they'd captured *both* of them?"

"I wish they'd come," Edwardson said.

Richard Everset and C. R. Jones had gone on the first interstellar flight. They had found an inhabited planet in the region of Vega. The rest was standard procedure.

A flip of the coin had decided it. Everset went down in the scouter, maintaining radio contact with Jones, in the ship.

The recording of that contact was preserved for all Earth to hear.

"Just met the natives," Everset said. "Funny looking bunch. Give you the physical description later."

"Are they trying to talk to you?" Jones asked, guiding the ship in a slow spiral over the planet.

"No. Hold it. Well I'm damned! They're telepathic! How do you like that?"

"Great," Jones said. "Go on."

"Hold it. Say, Jonesy, I don't know as I like these boys. They haven't got nice minds. Brother!"

"What is it?" Jones asked, lifting the ship a little higher.

"Minds! These bastards are power-crazy. Seems they've hit all the systems around here, looking for someone to—"

"Yeh?"

"I've got that a bit wrong," Everset said pleasantly. "They are not so bad."

Jones had a quick mind, a suspicious nature and good reflexes. He set the accelerator for all the G's he could take, lay down on the floor and said, "Tell me more."

"Come on down," Everset said, in violation of every law of spaceflight. "These guys are all right. As a matter of fact, they're the most marvelous—"

That was where the recording ended, because Jones was pinned to the floor by twenty G's acceleration as he boosted the ship to the level needed for the C-jump.

He broke three ribs getting home, but he got there.

A telepathic species was on the march. What was Earth going to do about it?

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

A lot of speculation necessarily clothed the bare bones of Jones' information. Evidently the species could take over a mind with ease. With Everset, it seemed that they had insinuated their thoughts into his, delicately altering his previous convictions. They had possessed him with remarkable ease.

How about Jones? Why hadn't they taken him? Was distance a factor? Or hadn't they been prepared for the suddenness of his departure?

One thing was certain. Everything Everset knew, the enemy knew. That meant they knew where Earth was, and how defenseless the planet was to their form of attack.

It could be expected that they were on their way.

Something was needed to nullify their tremendous advantage. But what sort of something? What armor is there against thought? How do you dodge a wavelength?

Pouch-eyed scientists gravely consulted their periodic tables.

And how do you know when a man has been possessed? Although the enemy was clumsy with Everset, would they continue to be clumsy? Wouldn't they learn?

Psychologists tore their hair and bewailed the absence of an absolute scale for humanity.

Of course, something had to be done at once. The answer, from a technological planet, was a technological one. Build a space fleet and equip it with some sort of a detection-fire network.

This was done in record time. The Attison Detector was developed, a cross between radar and the electroencephalograph. Any alteration from the typical human brain wave pattern of the occupants of a Detector-equipped ship would boost the indicator around the dial. Even a bad dream or a case of indigestion would jar it.

It seemed probable that any attempt to take over a human mind would disturb something. There had to be a point of interaction, somewhere.

That was what the Attison Detector was supposed to detect. Maybe it would.

The spaceships, three men to a ship, dotted space between Earth and Mars, forming a gigantic sphere with Earth in the center.

Tens of thousands of men crouched behind gunfire panels, watching the dials on the Attison Detector.

The unmoving dials.

"Do you think I could fire a couple of bursts?" Edwardson asked, his fingers on the gunfire

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

button. "Just to limber the guns?"

"Those guns don't need limbering," Cassel said, stroking his beard. "Besides, you'd throw the whole fleet into a panic."

"Cassel," Morse said, very quietly. "Get your hand off your beard."

"Why should I?" Cassel asked.

"Because," Morse answered, almost in a whisper, "I am about to ram it right down your fat throat."

Cassel grinned and tightened his fists. "Pleasure," he said. "I'm tired of looking at that scar of yours." He stood up.

"Cut it," Edwardson said wearily. "Watch the birdie."

"No reason to, really," Morse said, leaning back. "There's an alarm bell attached." But he looked at the dial.

"What if the bell doesn't work?" Edwardson asked. "What if the dial is jammed? How would you like something cold slithering into your mind?"

"The dial'll work," Cassel said. His eyes shifted from Edwardson's face to the motionless indicator.

"I think I'll sack in," Edwardson said.

"Stick around," Cassel said. "Play you some gin."

"All right." Edwardson found and shuffled the greasy cards, while Morse took a turn glaring at the dial.

"I sure wish they'd come," he said.

"Cut," Edwardson said, handing the pack to Cassel.

"I wonder what our friends look like," Morse said, watching the dial.

"Probably remarkably like us," Edwardson said, dealing the cards. Cassel picked them up one by one, slowly, as if he hoped something interesting would be under them.

"They should have given us another man," Cassel said. "We could play bridge."

"I don't play bridge," Edwardson said.

"You could learn."

"Why didn't we send a task force?" Morse asked. "Why didn't we bomb their planet?"

"Don't be dumb," Edwardson said. "We'd lose any ship we sent. Probably get them back at us, possessed and firing."

"Knock with nine," Cassel said.

"I don't give a good damn if you knock with a thousand," Edwardson said gaily. "How much do I owe you now?"

"Three million five hundred and eight thousand and ten. Dollars."

"I sure wish they'd come," Morse said.

"Want me to write a check?"

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

"Take your time. Take until next week."

"Someone should reason with the bastards," Morse said, looking out the port. Cassel immediately looked at the dial.

"I just thought of something," Edwardson said.

"Yeh?"

"I bet it feels horrible to have your mind grabbed," Edwardson said. "I bet it's awful."

"You'll know when it happens," Cassel said.

"Did Everset?"

"Probably. He just couldn't do anything about it."

"My mind feels fine," Cassel said. "But the first one of you guys starts acting queer—watch out."

They all laughed.

"Well," Edwardson said, "I'd sure like a chance to reason with them. This is stupid."

"Why not?" Cassel asked.

"You mean go out and meet *them?*"

"Sure," Cassel said. "We're doing no good sitting here."

"I should think we could do something," Edwardson said slowly. "After all, they're not invincible. They're reasoning beings."

Morse punched a course on the ship's tape, then looked up.

"You think we should contact the command? Tell them what we're doing?"

"No!" Cassel said, and Edwardson nodded in agreement. "Red tape. We'll just go out and see what we can do. If they won't talk, we'll blast 'em out of space."

"Look!"

Out of the port they could see the red flare of a reaction engine; the next ship in their sector, speeding forward.

"They must have got the same idea," Edwardson said.

"Let's get there first," Cassel said. Morse shoved the accelerator in and they were thrown back in their seats.

"That dial hasn't moved yet, has it?" Edwardson asked, over the clamor of the Detector alarm bell.

"Not a move out of it," Cassel said, looking at the dial with its indicator slammed all the way over to the highest notch.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

DECISION

BY FRANK M. ROBINSON

ILLUSTRATED BY H. R. SMITH

The captain had learned to hate. It was his profession—and his personal reason for going on. But even hatred has to be channeled for its maximum use, and no truths exist forever.

The battle alarm caught him in the middle of a dream, a dream that took place in a white house in a small town in Ohio, when both he and Alice had been very young and the grown adults he now called his children had really been little more than babies.

He rolled out of his bed immediately on hearing the gong, as any good sailor would, and slipped into his pants and shoes and felt around the bulkhead for his life jacket. He slipped into it and tightened the buckles, then put on his cap with the captain's insignia.

He opened the hatch and stepped out into the passageway, blinking for a moment in the unaccustomed light and trying to shake away the remnants of his dream. Officers were boiling up the passageway and up the ladder, some eager ensigns dressed only in their shorts and their life jackets. It was more wise than funny, he thought slowly. Ships had gone down in a matter of seconds and anybody who spent precious moments looking for his pants or his wallet never got out.

Harry Davis, the Exec, a portly man in his fifties, burst out of his stateroom, still trying to shake the sleep from gummy lids.

The Captain shook his head, trying to alert his mind to the point where it could make sensible evaluations, and started up the corridor.

"Any idea what it is, Harry?"

Davis shook his head. "Not unless it's what we've been expecting."

What we've been expecting. The Captain grasped the iron

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

piping that served for railings and jogged up the ladder. Fifty miles north, lolling in the North Sea and holding maneuvers, was the *Josef Dzugashvili*, a hundred thousand tons of the finest aircraft carrier the Asiatic Combine had produced, carrying close to a hundred Mig 72's and perhaps half a dozen light bombers.

The *Josef* had been operating there for nearly a week. The *Oahu* had been detached from the Atlantic Fleet only a few days ago, to combat the possible threat. Maybe the ships were only acting as stake-outs for the politicians, the Captain thought slowly. The tinder waiting for the spark. And it wouldn't take much.

A curious pilot who might venture too close, a gunner with a nervous temperament . . .

And now, maybe, this was it. It had to come some day. You couldn't turn the other cheek forever. And he, for one, was glad. He had spent almost all his life waiting for this. A chance to get even . . .

Davis opened the hatch to the wheelhouse and the Captain slipped in, closing it tight behind him. It was pitch black and it took his eyes a few moments to adjust to it. When they had, he could make out the shadowed forms of the OD, the first class quartermaster at the wheel, and the radarman hunched over the repeater, the scope a phosphorescent blur in the darkness.

The ports were open in violation of GQ—it was a hot summer night—and the slight breeze that blew off the swelling sea smelled clean and cool. It was the only kind of air for a man to breathe, the Captain mused abstractly.

He glanced sharply through the ports. There was nothing that bulked on the dark horizon, and so far as he could tell, all the stars were fixed—there were none of the tell-tale flashes of jet exhausts.

He walked over to where the OD stood by the radar scope, seemingly fascinated by the picture on it. McCandless had the watch, a young lieutenant of not more than twenty-five but one with good sense and sound judgment nonetheless. A man who wasn't prone to panic, the Captain thought.

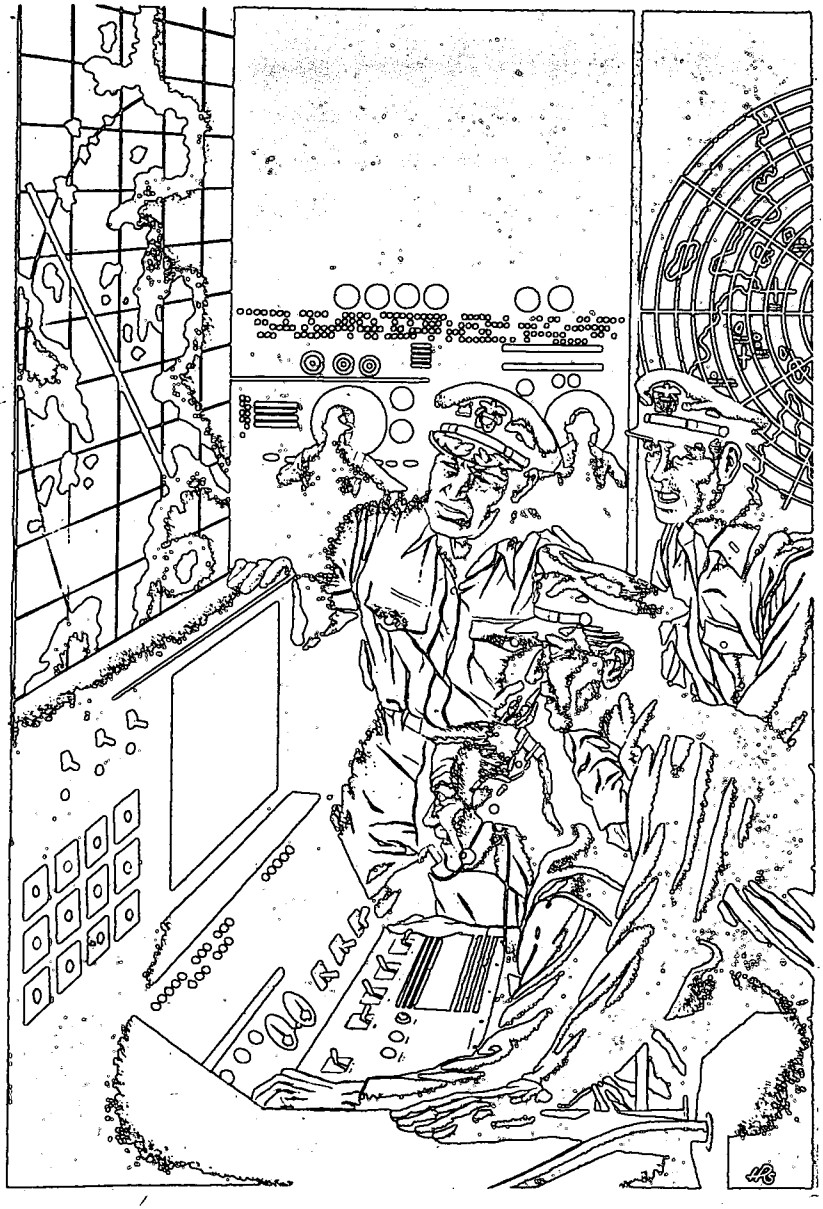
"What's the situation, Lieutenant?"

McCandless' voice was nervous. "I'm not exactly sure, sir. Not . . . yet."

A brief regret at an interrupted dream of Ohio flickered in the back of the Captain's mind.

"What do you mean, you're not

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED



LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

sure?" His voice was a little sharper than he intended, a little more querulous than he had meant it to be. It was, he thought, the voice of an old man, annoyed at having his sleep disturbed.

The younger man wasn't disturbed by the sharpness and the Captain's estimation of McCandless went up another notch.

"Ten minutes ago CIC reported an object approaching us from the south at an altitude of fifty miles."

Approaching from the south, the Captain thought. So it couldn't have been from the *Josef*. And fifty . . . miles . . . up. That was two hundred and fifty thousand feet. A guided missile, perhaps? But whose? There were only friendly countries to the south.

"It's passed directly overhead," McCandless continued, consciously trying to make his voice sound factual, "and continued in the direction of *Josef*. It settled towards sea level, then stopped a mile up."

"Stopped, Lieutenant?"

"Yes, sir. It's hovering over the *Josef* now." McCandless paused. When he started again, his voice was shaking. It was funny he hadn't noticed it before, the Captain thought. You could almost smell the fear in the wheel house. "CIC estimated its speed overhead as being in excess of a thousand miles an hour and its size about that of the *Josef* itself."

The Captain felt the sweat gather on his temples and ran his hand half angrily over his forehead and through his thinning silver hair. He was too old a man to let fear affect him any more and he was too tired a man to waste his energy mopping his forehead every few minutes in a gesture that would show his feelings to the crew. Maybe it was only vanity, he thought, but when your muscles went soft and started pushing back against your belt and your hair turned gray and started a strategic retreat, you tended to take more care of your reputation. It wasn't as fragile as the rest of you, it didn't tarnish with the gold of your braid or sag with your muscles. And he had enjoyed a reputation as a fearless man of sound judgment.

"Did you order up a drone plane?"

McCandless nodded in the dark. "It went up a few minutes ago, sir. The television picture should be coming in any moment."

It would be an infra-red picture, the Captain thought. It wouldn't show too much, provided the plane could get close enough to get anything at all,

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

but it would show something.

"Have you made any evaluations, Lieutenant?"

He could feel the tenseness build up again in the compartment. Everybody was listening intently, waiting for the first semi-official hint of what had gotten them up in the middle of the night.

Then McCandless voiced what the Captain had already taken to be a foregone conclusion.

"I think it's a space-ship, sir." McCandless waved at the stars beyond the port. "From some place out there."

The picture started coming in at oh three hundred. The Captain and Davis and McCandless clustered about the infra-red screen, watching the shadowy picture build up.

It wasn't much of a picture, the Captain thought. It was vague and indistinct and the drone plane was shooting the scene from too far away. But he could make out the *Dzugashvili*, a gloomy shape that bulked huge in the water, the planes clustered on its deck like small, black flies. But that wasn't what interested him. He had seen restricted photographs and complete descriptions and evaluations of the *Josef's* fighting capabilities before. What was of vastly more importance was the huge structure that hovered above the *Josef*, a mile overhead. A structure that blocked out the stars over a roughly rectangular area the same size as the *Josef* itself.

McCandless and Davis were still straining their eyes for details of the alien ship by the time the Captain had glanced away and was formulating policy. The picture was too vague, he thought. There was nothing that could be seen that would tell you much about the ship. And if they were correct in thinking it was a . . . his mind hesitated at the thought . . . spaceship, then it would be impossible to tell whether certain features were armament or not. And it would be futile to speculate on the capabilities of that armament.

McCandless and Davis finished with their inspection of the screen and turned to the Captain, waiting for orders.

"Recall the plane," the Captain said. "Send it out again at dawn. And send a message to Radio Washington, giving them complete details. You may relax GQ but keep the gunners at their posts and the pilots standing by." The fantastic became far more real when you dealt with it matter-of-factly, he thought.

He started for the hatch. "I'll

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

expect you down for breakfast," he said to Davis. "You, too, Lieutenant. You've been in on this from the start, you know more than the rest of us."

Which was quite enough flattery for a young lieutenant in one day, he thought. It was far more than he had ever received when he had been a lieutenant.

Back in his stateroom, the Captain went directly to the small lavatory, filled the washbowl, and plunged his face into the cold water. He was getting old, he thought for the hundredth time that morning. Creeping old age where you still awoke readily enough but found it more and more difficult to keep awake. You couldn't rid yourself of the temptation of going back to bed and dreaming again—dreaming, perhaps, of an Ohio town that his own imagination had gilded and varnished and adorned until sometimes he thought it existed only in his imagination and not in reality at all.

He scrubbed at his face until a tingle of alertness came to it, then went back to the main compartment. The steward had laid out the silver, and Davis and McCandless were already there. Davis completely relaxed in the atmosphere that could only exist between an Executive Officer and a Captain. The Exec, as both he and the Captain well knew, was the only man on board with whom the Captain could maintain a relationship that was something other than professional. Not necessarily friendly but . . . more relaxed.

McCandless sat in the leather upholstered chair by the table, stiff and self-conscious. The hope of the nation, the Captain thought. Provided that they learned how to hate and to keep that hate alive as long as he had kept his.

His own boy had been about McCandless' age, he thought suddenly.

"Well, what are you going to do?" Davis asked.

The Captain sat down at the table. The coffee was hot and he could smell the eggs that the steward was frying in the small galley. He tucked in a napkin at his neck. It was old fashioned but practical, he thought. You dribbled down the front, you didn't spill things in your lap.

"It isn't exactly up to me, Harry. It's up to Washington." he poured out three cups of coffee and handed one to Davis and one to McCandless. The Lieutenant clutched the cup in a deathlike grip, as if the ship were doing forty degree rolls and he might lose it any minute. "I asked you up to breakfast to get your ideas on it. I have my

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

own but on something like this, anybody's ideas are as good as mine. Maybe better."

Davis frowned and rubbed the tip of his nose thoughtfully. "Well, it looks to me, Bill, as if we have a situation here where an unknown ship from somewhere—I'm not saying where—has investigated two ships on maneuvers and finally chosen to hover over one, for what reasons we don't know. To me it looks like the only things we can do is notify Washington and stand by for orders."

Great God, the Captain thought, disgusted, there was nothing worse than a Commander bucking for four stripes. A more cautious man didn't exist on the face of the Earth nor, possibly, a more fearful one. Fear that whatever decision you made would be the wrong one and the Promotion Board would pass you by. So you carefully avoided making any decisions at all. He had been the same way himself. You salved your lack of guts with the knowledge that once you made captain, things would be different and you could assert yourself, be the man you had always considered yourself to be. Only once you became a captain things didn't change a bit because then you were trying to get the Promotion Board to recommend you for Admiral. The only men in the Navy who had any guts were the young men who didn't know any better and the old bastards who had made Admiral and no longer had any ambition as far as rank went.

He turned to McCandless. "You, Lieutenant?"

McCandless licked dry lips.

"I think it's from out in space, sir. Maybe it's an exploration party, but more than likely it's an armed scouting party."

"What makes you say that?"

McCandless leaned forward, his concern over his cup of coffee momentarily forgotten. "I think if it was an exploration party they would have stopped at some point of civilization first. In all likelihood a city, a big city. But we've received no reports of any ship landing near a city. At least, not yet." He paused, a little self-consciously. "It wouldn't be difficult to tell that we're part of the fighting forces of this planet, and I think it's just luck that it chose the *Josef* instead of us. I think the alien ship is investigating the *Josef*. Or will shortly."

Davis lit a cigarette, a half amused smile on his face. "For what purpose?"

"To test the armament. See how good we are on the defensive."

"What do you think they

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

want?" the Captain asked curiously.

McCandless hesitated, then blurted it out.

"The whole world, sir!"

At oh five hundred the sun was just breaking over the horizon, coating the heavy green seas with a soft covering of pink gold. It was going to be another hot day, the Captain thought, one where the heat stood off the water in little waves and the sweat ran down your back and soaked your khakis. And with GQ, the rubber life jackets would make it about ten times as bad.

He stood on the bridge for a moment, admiring the sunrise and smelling the brisk salt air, then walked into the wheelhouse.

The drone plane had been up for half an hour. By this time it should have a clearer picture of the object that hovered over the *Josef*.

It did. The object was dun colored, the color of storm clouds on a cold winter's day. Big, easily as big as the *Josef*, and tubular shaped, slightly flattened on the bottom. There was nothing that could be identified as gun ports but they probably didn't use guns. He wondered just what their armament was.

He turned to the radarman on watch.

"Has the *Josef* moved any?"

The man nodded. "Yes, sir. About oh four hundred they steamed ten miles north at top speed."

"The object kept up with them?"

"Yes, sir. It's never left them, sir. Same position directly overhead at all times."

The captain of the *Josef* must have realized that he couldn't get away from his overhead observer and probably froze in position, afraid of what would happen if he continued to run for it. He'd probably stay there until the alien ship made some hostile move or he got instructions from home.

The Captain walked back to the bridge. The ship was strangely silent. There were no jets warming up on the flight deck, there were no sounds of chipping hammers. Except for the planes overhead, it was a quiet summer day, one of those days when a perfectly smooth sea looks like a sheet of plate glass.

He glanced down at the sides of the *Oahu*. Tiny figures were huddled by the anti-aircraft guns, their helmets glinting in the sun. A tight ship, he thought, a ship that was ready for anything.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

McCandless came out on the bridge, his eyes red rimmed from lack of sleep. He stood a respectful distance from the Captain, a little to the right and just behind.

"Beautiful day, isn't it, Lieutenant?"

"Yes, sir. It is, sir. Very fine day."

Sir. That was the one reason why he tolerated Davis, the Captain thought. Just to hear somebody call him by his first name and treat him as something other than a symbol of rank.

"If your theory is correct, Lieutenant," he mused aloud, "then the alien ship should be opening fire—if that's what you would call it—any minute now."

"Yes, sir." McCandless brushed his mouth with his hand—probably surreptitiously removing a wad of gum, the Captain thought. "I was wondering what you would do, sir, if the alien ship opens fire on the *Josef*."

"If it wasn't against regulations, I'd issue a couple of cans of beer per man."

McCandless gaped. "I—I don't understand you, sir."

"If they finish off the *Josef*, Lieutenant, it'll save us the trouble. For my money, I'd be tickled pink if the Combine sent reinforcements and it really developed into a fracas."

McCandless turned slightly so the Captain could no longer read his face. The Captain wondered if it was intentional.

"I . . . I guess I just took it for granted that we'd join forces against the aliens, sir. It seemed like the natural thing to do."

So McCandless had thought they'd go to the rescue of the *Josef*, the Captain thought slowly. To the rescue. The phrase had a funny sound to it when you coupled it with the Combine, an almost obscene sound.

"Lieutenant," the Captain said slowly, "history has been full of possible turning points that the United States has almost always failed to take advantage of. I think this time, just for once, we ought to play it smart. The Combine has been a threat for as long as I can remember. We've had opportunities before when we could have let two systems cancel each other out. We didn't take advantage of it then and we've regretted it ever since."

McCandless didn't reply immediately and the Captain thought to himself, why not be more honest? Why don't you tell him that all your life you've fought the Combine and the conflict has been the only thing that has lent meaning to living? You hate for thirty years and you become a slave to that hatred—you don't forget it with a snap of

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

the fingers and go charging to the rescue like a knight in shining armor.

"The aliens are . . . alien, sir," McCandless suddenly said. "The men on the *Josef* are . . . human beings."

"Are they, Mister?" The Captain hated the lecturing attitude but he couldn't help it. "They're the representatives of the Combine, aren't they? And I suppose the Combine acted like human beings during the Berlin war? I suppose the slave labor camps and the purges and the forced confessions were the products of ordinary human beings? No, Lieutenant, if the aliens have six arms and two heads they couldn't be less inhuman than the Combine has been!"

"My father was in the Pacific in the Second World War," the Lieutenant said tightly. "There were times when we . . . didn't take prisoners. And I remember my Dad saying that some of the men went home with ear necklaces."

"Hearsay," the Captain said gruffly. "And that was in a declared war." And then he wondered just how valid the distinction was. There were, he supposed, sadists on both sides. And then it came down to who committed the first cruelty and just how should you rank them? Was intentional torture for the few any the worse than the dispassionate act of dropping a bomb that produced quite the same, if not worse, results for the many?

"Just what would you do, Mister McCandless?"

The Lieutenant's face was flushed. "I'm not sure, sir. But I think I would look at it from a strategic viewpoint. There are two ships here, both instruments of war. If the aliens attack the one, and the other doesn't go to the rescue, then it would be obvious that we are a divided world. We would be a tempting . . . prize."

"And if we went to the aid of the *Josef*, then you think we might beat the alien ship off?"

McCandless shrugged. "I don't know, sir. We might."

The Captain turned back to look at the now swelling sea. The air off the water was cool and brisk and the deck of his ship moved comfortably under his feet; a solid thing in a liquid world.

"It doesn't make a great deal of difference what we think, Lieutenant," the Captain said, a little of his good humor restored. "In the long run, we'll do whatever Washington says."

There was a sudden, flashing glow just over the horizon. McCandless blanched and the Captain clutched the rail, his

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

knuckles turning white with the force of his grip. There was another flash and the OD popped out of the hatch of the wheelhouse like a cork out of a bottle. "Captain! the . . ."

The Captain was already brushing past him, heading into the pilothouse for the television screen and the picture that the drone plane was transmitting.

The picture on the screen wavered and blurred with the shock of the action. From what he could see, the Captain knew that whatever action he took, if any, he would have to take it within a relative few minutes. The forward half of the superstructure of the *Josef* was a smoking ruin, the metal a cherry red.

Half the planes on the flight deck were charred and being frantically pushed overboard by small tractors so the remainder of the planes could be air-borne. A mile overhead, in the glazing blue sky, the few planes the *Josef* had managed to launch buzzed futilely about the alien ship, discharging rockets that scintillated and flamed off the dull gray sides and, so far as the Captain could tell, were causing no damage at all.

"Message for you, sir."

He felt the clip board being pushed into his hand, then glanced down. It was difficult to read without his glasses but he could make it out.

Unusual . . . do nothing rash . . . your discretion . . .

Some cautious pen pusher behind a desk, he thought chaotically. Somebody for whom miles had lent safety and detachment.

His discretion . . .

It was his responsibility.

Commander Davis was at his elbow. "The *Josef's* starting to list, Captain."

"I can see that!" he half snarled.

He wouldn't feel pity if the *Josef* went down, he thought fiercely. It would be good riddance, one less carrier that they would have to worry about at some future date.

If there was some future date, a nagging thought intruded.

He throttled it. The *Josef* stood for everything that he despised, a way of life that had made a mockery of everything he had been taught to believe in. The menace that had eaten at the world's vitals like a cancer, the menace whose existence had been enough to drive some men to hysteria and others to the brink of suicide. His own wife . . .

Now a ship from Outside was attacking that power and what emotions should he feel? Ela-

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

tion? Well, why not? What other emotions should he feel? Certainly not sadness, not regret, not pity.

The *Josef* would be sunk and maybe the aliens would be tempted to do more than just attack the *Josef;* they might attack the entire Combine as well. And if the Combine was beat, did it matter who did it?

Except, the thought crept back, there was no reason for him to believe that the aliens would differentiate between the *Josef* and the *Oahu,* between the Combine and the United States.

"The planes!" McCandless said, incredulous. "Look at the planes!"

The Captain glanced down at the screen again. An orangish glow was suffusing the alien ship. A jet slipped in for a rocket shot. The glow pulsed, expanded, touched the jet, and the plane vanished into a rain of wreckage that sped towards the ocean below.

"God!" Davis breathed. "Did you see that?"

The Captain only half heard him. So they were aliens. What did that mean? Beings of different background, different beliefs, different physical structure? He had been one of the first into Berlin after the massacre was over and the Combine had laid the blame on their Berlin Commandant, though it was painfully obvious that he had only followed out instructions. And the shambles he had seen there couldn't have been done by human beings. Four thousand soldiers and close to a hundred thousand civilians killed. Would you call the people who had been responsible for that human beings or . . . aliens? Which name fit best?

The Berlin war . . .

A dozen different outbreaks, starting with Korea so long ago . . .

And then you were supposed to admit that they were blood brothers after all, and that in the face of a mutual threat you should forget your differences and pool your resources against the common enemy.

"There goes another one!"

So in fifteen minutes the *Josef* would go down. And from him it would bring only cheers, not tears.

But you didn't make decisions on a personal basis, he thought slowly. You had to look at it from the viewpoint of a thousand years. You had to develop a certain detachment, even though one man's lifetime was far too short a period to develop it in.

"Message for you, Captain."

It was a voice message that had been picked up in CIC. It

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

was brief and to the point. *Attention Captain United States Vessel* Oahu:

Help urgently requested. If aid not granted immediately, all is lost.

Constantin Simenovich,
Captain, People's Warship
Josef Dzugashvili.

He had a brief mental picture of a young man lying in the shambles of Berlin calling out the same words. And what had he received?

He buried the thought.

The detached viewpoint. Political systems evolved, he thought, they never remained the same. The French Revolution had spawned a thousand human monsters and the blood had run in the streets. But out of it all had come a democratic nation. And a thousand years from now, what would the Combine be? A turn of the wheel and perhaps it would be a peace-loving democracy while the United States would be the abattoir of human hopes. Who could tell? A thousand years from now the present blood baths and tortures and mass deaths would be history.

But if the aliens won you ran the chance of there being no history at all.

The wheelhouse was silent. The Captain could feel a dozen pairs of eyes watching him, waiting for his decision. Outside the ports, on the far horizon, there came a steady, golden pulsing.

He looked up at McCandless and Davis. McCandless was young, too inexperienced to realize that situations where today's enemies are tomorrow's friends are the order of the day and not the exception. You adjusted to it or you became bitter. Davis, the gutless bastard, had adjusted to it. He was probably already to make the switch, to go back to drinking toasts in vodka.

The detached viewpoint.

"Send up the jets," the Captain said slowly. "And send a message to the Captain of the *Josef*, telling him we'll render all the assistance that we can."

The wheelhouse broke into a flurry of activity and a moment later he could hear the sounds of the jets taking off the flight deck. He walked out on the bridge deck and leaned on the railing, staring at the horizon where the alien ship and the *Josef* were fighting it out. And where planes from the *Oahu* would shortly be helping the *Josef*.

But I still hate them, he thought. *I hate their goddammed souls!*

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

BOOK REVIEWS:

SCIENCE: Fact and Fiction

by

GEORGE O. SMITH

Now and then (if you don't mind listening to one of the problems of a book reviewer) one is faced by the insoluble dilemma of Trying To Be Honest.

Let's face one thing: A review column such as this is considered as advertising on the part of the publisher. This is why publishers ship out a large number of review copies in the hope of having their book reviewed in a large number of columns. Even when the critic belts the book heavily over the backstrip for divers reasons it is considered advertising. Part of this is the old theory that any publicity is good publicity and part of it is due to the fact that the very thing that irks Critic A may be the very reason why B, C, D, and E through Z, rush out to buy it. John W. Campbell once said that he frequently accepted a well-written story, the theme material of which he did not personally agree with, because he knew that such a story would appeal to a lot of people who did not agree with his personal taste all along the line.

But one large problem presents itself when the critic is faced with giving unto himself the same sort of publicity as he gives other authors. Any critic would be an imbecile to ignore the fact that he has written a book himself. On the other hand, how in the devil can an author review his own book in the same weight as he reviews the books of others?

There are a number of ways this has been done, to date.

The critic can farm his book out to a trusted friend for reviewing. In fact, several friends, so the critic can pick out the best write-up and post it with the frank claim that he touched not the copy. This also tends to inform the critic which are his best friends; a slam review will dislodge the former friend from favor. Or one can pick a contemporary writer with the obvious, unstated idea that woe betide any contemporary who is so bold as to make light of the current effort. (This is the "Wait until *I* come to bat, chum!" program.)

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Second, one can take matter in his own hands and write the review under a pen name, or alias. This insures a good review at all times. It is also very profitable if the critic-author writes quite a bit under both names and has also two sources of book-review outlet. In fact, I can hardly wait for that famous Sunday when H. H. Holmes reviews Anthony Boucher in the Herald Tribune at the same time that Anthony Boucher is reviewing H. H. Holmes in the Times. (If Mr. William A. P. Whife does not like what H. H. Holmes says about Anthony Boucher, it is his own darned fault!)

Third, the critic can pan the dickens out of his own work of art, calm and serene in the knowledge that everybody knows that he does not mean it. Or he can slaver on the praise with a trowel so thick that everybody knows that he is merely playing games. The latter is preferable because there are a lot of gullible souls who will take anything put out in cold print as The Gospel. Furthermore, there is that dull, serene silence that always follows when the author, with overwhelming honesty, says to a friend: "That last job of mine was a clinker, wasn't it?"; and said friend nods affably and replies: "It sure was!"

Or one can do the following:

HELLFLOWER, by George O. Smith (Abelard, $2.75) • This is an interplanetary dope-smuggling space opera, written by a guy who enjoyed writing it. The proceeds of this venture from the May, 1952 *Startling Stories* paid for a vacation to Colorado Springs with Robert A. Heinlein, which was more fun than the writing. Characters who write in to complain that the book version does not read word for word with the magazine version will be boiled in transformer oil.

Have I made my point?

STAR SCIENCE FICTION STORIES, an original anthology edited by Frederick Pohl. (Ballantine Books, 35c and $1.50) • This is an excellent collection, running alphabetically from Isaac Asimov to John Wyndham and covering a lot of good rich ground between. None of this collection of 15 has ever been printed before, which carries the volume right out of the usual anthology class. (If you can't get the hard-cover edition, try the 35c edition. Ballantine Books has no fear of competing against themselves; they bring the pocket and the hard-cover volumes out simultaneously. I doubt that the rest of us will ever hear whether this is a financially sound procedure directly, but if it works, it will be shown by continued operations along these same lines. My personal opinion is that it is sound.)

(Continued on page 157)

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

What A Buy! Complete With POWER GLASS ROD!

MADE TO SELL FOR $14.95

$9.95

89 PIECE FISHING OUTFIT

LEVEL WIND REEL AND ALL ACCESSORIES

HIGH GRADE METAL MOUNTING

Lordline

You Get All This At One LOW PRICE!

- Genuine POWER GLASS ROD
- LAWRENCE Level Wind Metal Reel
- 1 Nylon Line (50 Yards)
- 6 CARLISLE Snelled Hooks
- 12 IDEAL Pinch-On Sinkers
- 12 IDEAL Adjustable Sinkers
- 50 PFLUEGER Hooks (Asst. Sizes)
- 1 Stringer
- 1 Bass Lure (6 Hook)
- 1 Float
- 1 June Bug Spinner
- 1 Fish Scaler
- 1 — 24 Page Fishing Manual

Plus... At No Extra Cost

LIBERTY Steel Tackle Box With Hinged Cantilever Tray

AT NO EXTRA COST

Made by These Famous Manufacturers!

- LAWRENCE
- PFLUEGER
- CARLISLE
- LIBERTY
- IDEAL

Seeing's believing... so see them today. See these big... big fishing outfits with the sturdy POWER GLASS RODS. You'll be amazed at the value... you'll appreciate the LOW, LOW price. Outfits like these are selling for many dollars more so be sure to order yours now and cash in on this remarkable money saving offer.

OUR GIFT TO YOU! LIBERTY Steel Tackle Box With Hinged Cantilever Tray

24 PAGE FISHING MANUAL

How to take more fish

ADJUSTABLE SINKERS

PFLUEGER HANDE-PAK FISH HOOKS 50 PFLUEGER Hooks

6 SNELLED HOOKS

150 ft. NYLON LINE

Supertwist CUTTYHUNK NYLON

POWER GLASS ROD

STRINGER

SPEED SCALER

METAL SCALER

LAWRENCE Level Wind REEL

MAIL SALES, 80 FIFTH AVENUE, NEW YORK, N. Y., DEPT. 28

SEND ME THE 89 PIECE FISHING OUTFIT AT THE SPECIAL LOW PRICE OF $9.95. I AM ENCLOSING MONEY ORDER, CHECK FOR $9.95 POSTAGE-FREE SHIPMENT. (CIRCLE ONE)

☐ SEND C.O.D. I WILL PAY POSTMAN $9.95 PLUS CHARGES.

NAME.....

ADDRESS.....

CITY.....ZONE....STATE.....

(PRINT CLEARLY)

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

THE ESCAPE

BY POUL ANDERSON

ILLUSTRATED BY ORBAN

The effect of the Change was actually rather small—but great enough to make foxes open locked doors, turn a moron into a super-moron, and give Earth a galaxy while its own system fell to pieces under it!

(FIRST OF TWO PARTS)

I

The trap had closed at sundown. In the last red light, the rabbit had battered himself against its walls until fear and numbness ached home and he crouched shaken by the flutterings of his heart. Otherwise there was no movement in him as night and the stars came. But when the moon rose, its light was caught icily in his great eyes, and he looked through shadows to the forest.

His vision was not made to focus closely, but after a while it fell on the entrance to the trap. It had snapped down after him when he entered, and then there had been only the flat bruising beat of himself against the wood. Now slowly, straining through the white unreal haze that was the moonlight, he recalled a memory of the gate falling, and he squeaked ever so faintly with terror. For the gate was there now, solid and sullen against the breathing forest, and yet it *had* been up and *had* come thunking down, and this now-then doubleness was something the rabbit had never known before.

The moon rose higher, swinging through a sky full of stars. An owl hooted, and the rabbit froze into movelessness as its wings ghosted overhead. There was fear and bewilderment and a new kind of pain in the owl's voice, too. Presently it was gone, and only the many little murmurs and smells of night were around him. And he sat for a long time looking at the gate and remembering how it had fallen.

The moon began to fall too,

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

into a paling western heaven. Perhaps the rabbit wept a little, in his own way. A dawn which was as yet only a mist in the dark limned the bars of the trap against gray trees. And there was a crossbar seated low on the gate.

Slowly, very slowly, the rabbit inched across until he was at the entrance. He shrank from the thing which had clamped him in. It smelled of man. Then he nosed it, feeling dew cold and wet on his muzzle. It did not stir. But it had fallen *down*.

The rabbit crouched, bracing his shoulders against the crossbar. He strained then, heaving upward, and the wood shivered. The rabbit's breath came fast and sharp, whistling between his teeth, and he tried again. The gate moved upward in its grooves, and the rabbit bolted free.

For an instant he poised wildly. The sinking moon was a blind dazzle in his eyes. The gate smacked back into place, and he turned and fled.

Archie Brock had been out late grubbing stumps in the north forty. Mr. Rossman wanted them all pulled by Wednesday so he could get the plowing started in his new field, and promised Brock extra pay if he would see to it. So Brock took some dinner out with him and worked till it got too dark to see. Then he started walking the three miles home, because they didn't let him use the jeep or a truck.

He was tired without thinking of it, aching a little and wishing he had a nice tall beer. But mostly he didn't think at all, just picked them up and laid them down, and the road slid away behind him. There were dark woods on either side, throwing long shadows across the moon-whitened dust, and he heard the noise of crickets chirring and once there was an owl. Have to take a gun and get that owl before he swiped some chickens. Mr. Rossman didn't mind if Brock hunted. Mr. Rossman was all right.

It was funny the way he kept thinking things tonight. Usually he just went along, especially when he was as tired as now, but—maybe it was the moon—he kept remembering bits of things, and words sort of formed themselves in his head like somebody was talking. He thought about his bed and how nice it would have been to drive home from work; only of course he got sort of mixed up when driving, and there'd been a couple of smashups. Funny he should have done that, because all at once it didn't seem so hard: just a few signals to learn, and you kept your eyes open, and that was all.

The sound of his feet was hollow on the road. He breathed deeply, drawing a cool night into his lungs, and looked upward, away from the moon. The stars

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

were sure big and bright tonight.

Another memory came back to him, somebody had said the stars were like the sun only further away. It hadn't made much sense then. But maybe it was so, like a light was a small thing till you got up close and then maybe it was very big. Only if the stars were as big as the sun, they'd have to be awful far away.

He stopped dead, feeling a sudden cold run through him. Good Lord! How far *up* the stars were!

The earth seemed to fall away underfoot, he was hanging on to a tiny rock that spun crazily through an everlasting darkness, and the great stars burned and roared around him, so far up that he whimpered with knowing it.

He began to run.

Jimmy Cobden rose early, even if it was summer and no school and breakfast wouldn't be for a while yet. The street and the town outside his windows looked very clean and bright in the young sunshine, and not many people were out yet. A single truck clattered down the road and a man in blue denim walked toward the creamery carrying a lunch pail, otherwise it was as if he had the whole world to himself. His father was already off to work, and Mom liked to go back to bed for a while after fixing his breakfast, and Sis was still asleep, so Jimmy was all alone in the house.

Sam Thomson was coming over and they'd go fishing, but Jimmy wanted to get some more done on his model plane. He washed as thoroughly as you could ask a ten-year-old to, snatched a roll from the pantry, and went back to his room and the littered table there. The plane was going to be a real beauty, a Shooting Star with a CO_2 cartridge to make a jet. Only somehow, this morning it didn't look as good as it had last night. He wished he could buy a real jet motor for it.

He sighed, pushing the work away, and took a sheet of paper. He'd always liked to doodle around with numbers, and Miss Trench had taught him a little about algebra. Some of the fellows had called him teacher's pet for that, till he licked them, but it was real interesting, not just like learning multiplication tables. Here you made the numbers and letters *do* something. Miss Trench said if he really wanted to build spaceships when he grew up, he'd have to learn lots of math.

He started drawing some graphs. The different kinds of equations made different pictures. It was fun to see how $x=ky+c$ made a straight line while $x^2+y^2=c$ was always a circle. Only how if you changed one of the x's, made it equal 3 instead of 2? What would be happening to the y in the mean-

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

time? He'd never thought of that before!

He grasped the pencil tightly, his tongue sticking out of the corner of his mouth. You had to kind of sneak up on the x and the y, change one of them just a weeny little bit, and then . . .

He was well on the way to inventing differential calculus when his mother called him down to breakfast.

II

Peter Corinth came out of the shower, still singing vigorously, to find Sheila busy frying bacon and eggs: He ruffled her soft brown hair up, kissing her on the neck, and she turned to smile at him.

"She looks like an angel and cooks like an angel," he said.

"Why, Pete," she answered. "You never—"

"Never could find words," he agreed. "But it's gospel truth, me love." He bent over the pan, inhaling the crisp odor with a contented sigh. "I have a hunch this is one of those days when everything will go right," he said. "A bit of *hubris* for which the gods will doubtless visit a *nemesis* on me. *Ate*: Gertie, the slut, will burn out a tube. But you'll amend it all."

"*Hubris—nemesis—ate.*" A tiny frown creased her broad clear forehead. "You've used those words before, Pete. What do they mean?"

He blinked at her. Two years after marriage, he was still far gone in love with his wife, and as she stood there his heart turned over within him. She was kind and merry and beautiful and she could cook—but she was nothing of an intellectual, and when his friends came over she sat quietly back, taking no part in the conversation. "What do you care?" he asked.

"I was just wondering," she said.

He went into the bedroom and began dressing, leaving the door open so he could explain the basis of Greek tragedy. It was much too bright a morning to dwell on so somber a theme, but she listened closely, with an occasional question. When he came out, she smiled and went over to him.

"You dear clumsy physicist," she said. "You're the only man I ever knew who could put on a suit straight from the cleaners and make it look like you'd been fixing a car in it." She adjusted his tie and pulled down the rumpled coat. He ran a hand through his black hair, immediately reducing it to unkemptness, and followed her to the kitchenette table. A whiff of steam from the coffeepot fogged his horn-rimmed glasses, and he took them off and polished them on his necktie. His lean, broken-nosed face looked different without them—younger, perhaps only the thirty years which was his actual age.

"It came to me just when I

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

woke up," he said as he buttered his toast. "I must have a well-trained subconscious after all."

"You mean the solution to your problem?" asked Sheila.

He nodded, too absorbed to consider what her query meant. She usually just let him run on, saying "yes" and "no" in the right places but not really listening. To her, his work was altogether mysterious. He had sometimes thought she lived in a child's world, with nothing very well known but all of it bright and strange.

"I've been trying to build a phase analyzer for intermolecular resonance bonds in crystal structure," he said. "Well, no matter. The thing is, I've been plugging along for the past few weeks, trying to design a circuit which would do what I want, and was baffled. Then I woke up just this morning with an idea that might work. Let's see—" His eyes looked beyond her, and he ate without tasting. Sheila laughed, very softly.

"I may be late tonight," he said at the door. "If this new idea of mine pans out, I may not want to break off work till —Lord knows when. I'll call you."

"Okay, honey. Good hunting."

When he was gone, Sheila stood for a moment smiling after him. Pete was a—well, she was just lucky, that was all. She'd never really appreciated how lucky, but this morning seemed different, somehow. Everything stood out sharp and clear, as if she were up in the Western mountains her husband loved so well.

She hummed to herself as she washed the dishes and straightened up the apartment. Memory slid through her, the small-town Pennsylvania girlhood, the business college, her coming to New York four years ago to take a clerical job at the office of a family acquaintance. Dear God, but she had been unsuited for that kind of life! One party and boy friend after another, everybody fast-talking, jerky-moving, carefully hard-boiled and knowing, the expensive and market-wise crowd where she always had to be on her guard— All right, she'd married Pete on the rebound, after Bill walked out calling her a stupid—never mind. But she'd always liked the shy, quiet man, and she had been on the rebound from a whole concept of living.

So I'm stodgy now, she told herself, *and glad of it, too.*

An ordinary housewifely existence, nothing more spectacular than a few friends in for beer and talk, going to church now and then while Pete, the agnostic, slept late; vacation trips in New England, the Rocky Mountains; plans of having a kid soon—who wanted more? Her friends before had always been ready for a good laugh at the shibboleth-ridden boredom which was bourgeois existence; but when you got right down to

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

it, they had only traded one routine and one set of catchwords for another, and seemed to have lost something of reality into the bargain.

Sheila shook her head, puzzled. It wasn't like her to go daydreaming this way. Her thoughts even sounded different.

She finished the housework and looked about her. Normally she would have relaxed for awhile before lunch, maybe reading one of the pocket mysteries which were her prime vice; afterward there was some shopping to do, maybe a stroll in the park, maybe a visit to or from some woman friend, and then supper to fix and Pete to expect. But she didn't feel like it today.

She walked over to the crowded bookshelf which filled one wall. Pete went in for literature, though he never called it by any such name. She had honestly tried to read it, but—well, you went to sleep. It was her one sorrow, that so much of her husband's life should lie beyond the edge of her own.

You know, she thought, *I feel energetic today. I think I'll try some of his beloved Joseph Conrad again.*

She picked up the worn copy of *Lord Jim* and took it to an armchair. It was mid-afternoon before she remembered that she had forgotten all about lunch.

Corinth met Felix Mandelbaum in the elevator going down. They were that rare combination, neighbors in a New York apartment building who had become friends. Sheila, with her small-town background, had insisted on getting to know everyone on their own floor at least, and Corinth had been glad of it in the case of the Mandelbaums. Sarah was a plump, quiet, retiring hausfrau sort, pleasant but not colorful; her husband was a horse of quite another shade.

Fifty years old, Felix Mandelbaum had begun in the noise and dirt and sweatshops of the lower East Side, and life had been kicking him around ever since; but he kicked back, and enjoyed it hugely. He'd been everything from itinerant fruit-picker to skilled machinist and O.S.S. operative overseas during the war—where his talent for languages and people must have come in handy. His career as a labor organizer ran parallel, from the old Wobblies to the comparative respectability of his present job; officially executive secretary of a local union, actually a roving trouble-shooter with considerable voice in national councils. Not that he had been a radical since his twenties: he said he'd seen radicalism from the inside, and that was enough for any sane man. Indeed, he claimed to be one of the last true conservatives—only to conserve, you had to prune and graft and adjust. He was self-educated but widely

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

read, with more capacity for life than anyone else of Corinth's circle except possibly Nat Lewis. Fun to know.

"Hello," said the physicist. "You're late today."

"Not exactly." Mandelbaum's voice was a harsh New York tone, fast and clipped. He was a small, wiry, gray-haired man, with a gnarled beaky face and intense dark eyes. "I woke up with an idea. A reorganization plan. Amazing nobody's thought of it yet. It'd halve the paper work. So I've been outlining a chart."

Corinth shook his head dolefully. "By now, Felix, you should know that Americans are too fond of paper work to give up one sheet," he said.

"You haven't seen Europeans," grunted Mandelbaum.

"You know," said Corinth, "it's funny you should've had your idea just today. I woke up with the solution to a problem that's been bedeviling me for the past month."

"Hm?" Mandelbaum pounced on the fact, you could almost see him turning it over in his hands, sniffing it, and laying it aside. "Odd." It was a dismissal.

The elevator stopped and they parted company. Corinth took the subway as usual. He was currently between cars; in this town, it just didn't pay to own one. He noticed vaguely that the train was quieter than ordinarily. People were less hurried and unmannerly, they seemed thoughtful. He glanced at the newspapers, wondering with a gulp if *it* had started, but there was nothing sensational. Fighting here and there throughout the world, a strike, a Communist demonstration in Rome, another rocket sent to the new space station, four killed in an auto crash —words, as if rotary presses squeezed the blood from everything that went through them.

Emerging in lower Manhattan, he walked three blocks to the Rossman Institute, limping a trifle. The same accident which had broken his nose years ago had injured his right knee and kept him out of military service; though being yanked directly from his youthful college graduation into the Manhattan Project might have had something to do with that.

He winced at the trailing memory. Hiroshima and Nagasaki still lay heavily on his conscience. He'd quit immediately after the war, and it was not only to resume his studies or to escape the red tape and probing and petty intrigue of government research for the underpaid sanity of academic life; it had been a flight from guilt. So had his later activities, he supposed—the Atomic Scientists, the United World Federalists, the Progressive Party. When he thought how those had withered away or been betrayed, and recalled the brave clichés which had stood like a shield between

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

him and the Soviet snarl there for any to see who had eyes, he wondered how sane the professors were after all.

Only was his present retreat into pure research and political passivity—voting a discouraged Democratic ticket and doing nothing else—any more balanced? Nathan Lewis, blast his reactionary hide, was a local Republican committeeman, an utter and cheerful pessimist who still tried to salvage something; and Felix Mandelbaum, no less realistic than his chess and bull session opponent Lewis, had more hope and energy, even looked forward to the ultimate creation of a genuine American Labor Party. Between them, Corinth felt rather pallid.

And I'm younger than either one!

He sighed. What was the matter with him? Thoughts kept boiling up out of nowhere, forgotten things, linking themselves into new chains that rattled in his skull. And just when he had the answer to his problem, too.

That reflection drove all others out. Again, it was unusual; ordinarily he was slow to change any train of thought. He stepped forward with a renewed briskness.

The Rossman Institute was a bulk of stone and glass, filling half a block and looking almost shiny among its older neighbors. It was known as a scientist's heaven. Able men from all places and all disciplines were drawn there, less by the good pay than by the chance to do unhampered research of their own choosing, with first-rate equipment and no deadlines. It had the inevitable politicking and backbiting, but in lesser degree than the average college; it was the Institute for Advanced Study, less abstruse and more energetic, perhaps, and certainly with much more room. Lewis had once cited it to Mandelbaum as proof of the cultural necessity for a privileged class. "D'you think any government would ever endow such a thing and then, what's more, have the sense to leave it to itself?"

"Brookhaven does all right," Mandelbaum had said, but for him it was a feeble answer.

Corinth nodded to the girl at the newsstand in the lobby, and fumed at the slowness of the elevator. "Seventh," he said automatically when it arrived.

"I should know that, Dr. Corinth," grinned the operator. "You've been here—let's see—almost six years now, isn't it?"

The physicist blinked. The attendant had always been part of the machinery to him; they had exchanged the usual pleasantries, but it hadn't meant a thing. Suddenly Corinth saw him as a human being, a living and unique organism, part of an enormous impersonal web which ultimately became the entire universe, and yet bearing his

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

own heart within him. *Now why,* he asked himself amazedly, *should I think that?*

"You know, sir," said the attendant, "I been wondering. I woke up this morning and wondered what I was doing this for and if I really wanted more out of it than just my job and my pension, and—" He paused awkwardly as they stopped to let off a third-floor passenger. "I envy you. You're going somewhere."

The elevator reached the seventh floor. "You could, well, you could take a night course if you wanted to," said Corinth.

"I think maybe I will, sir. If you'd be so kind as to recommend—well, later. I got to go now." The doors slid smoothly across the cage, and Corinth went down hard marble ways to his laboratory.

He had a permanent staff of two, Johansson and Grunewald, intense young men who probably dreamed of having labs of their own some day. They were already there as he entered and took off his coat.

"Good morning . . . 'Morning . . . 'Morning."

"I've been thinking, Pete," said Grunewald suddenly, as the chief went over to his desk. "I've got an idea for this circuit that may work—"

"*Et tu, Brute,*" murmured Corinth. He sat down on a stool, doubling his long legs under him. "Let's have it."

Grunewald's gimmick seemed remarkably parallel to his own. Johansson, usually silent and competent and no more, chimed in eagerly as thoughts occurred to him. Corinth took over leadership in the discussion, and within half an hour they were covering paper with the esoteric symbols of electronics.

Rossman might not have been entirely disinterested in establishing the Institute, though a man with his bank account could afford altruism. Pure research helped industry, and Corinth's study of crystal bonds could mean a good deal to metallurgy. Grunewald fairly gloated over the prospect of what success would do to their professional reputations. Before noon, they had set up a series of partial differential equations which would go to the computer at their regularly scheduled time to use it, and were drawing up elements of the circuit they wanted.

The phone rang. It was Lewis, suggesting lunch together. "I'm on a hot trail today," said Corinth. "I thought maybe I'd just have some sandwiches sent up."

"Well, I'm not," said Lewis gloomily. "Something's gone very, very wrong for me, and I wish you'd let me weep on your shoulder."

"Oh, all right. Commissary do?"

"If you merely want to fill your belly, I suppose so." Lewis went in for three-hour lunches complete with wine and violins,

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

a habit he had picked up during his years in pre-Anschluss Vienna. "One o'clock do? The peasantry will have gorged by then."

"Okay." Corinth hung up and lost himself again in the cool ecstasy of his work. It was 1:30 before he noticed the time, and he hurried off swearing.

Lewis was just seating himself at a table when Corinth brought his tray over. "I figured from your way of talk you'd be late," he said. "What'd you get? The usual cafeteria menu, I suppose: mice drowned in skim milk, fillet of sea urchin, baked chef's special, baked chef—well, no matter." He sipped his coffee and winced.

He didn't look delicate: a short square man of forty-eight, getting a little plump and bald now, sharp eyes behind thick rimless glasses. He was, indeed, a hearty soul at table or saloon. But eight years in Europe did change tastes, and he insisted that his post-war visits had been purely gastronomical.

"What you need," said Corinth with the smugness of a convert, "is to get married."

"I used to think so, when I began leaving my libertine days behind. But then I'd get to thinking of a rainy day in Paris, and the dearest little tart I ever —well, never mind. Too late now." Lewis attacked a minute steak, which he always pronounced as if the adjective were synonymous with "tiny," and scowled through a mouthful. "I'm more interested in the histological aspect of biology just now."

"You said you were having trouble—"

"Uh-huh. You know my work? I'm studying neurones—nerve cells. Trying to culture them in artificial media. Young Roberts thinks it may eventually lead to a way of replacing damaged nerve tissue, but he's an incurable romantic. Anyway, I had me a nice string of cells, still living in an excised section of tissue. Lindbergh-Carrel technique, with modifications. I was studying their measurable characteristics: elasticity, electrical properties, and so on. They vary somewhat with different media, and I'm trying to correlate the variations with—Koch knows what. Yesterday I had a beautiful set-up, everything measured. This morning Roberts ran the tests again and the results came out different."

"Hm?" Corinth raised his eyebrows and chewed quietly for a minute. "Well, what of it? So something has changed. The solution you're keeping them in, maybe. Did your Roberts get careless?"

"I thought so at first, and chewed him out for it. He invited me to check the whole set-up. I did. Nothing changed—except the cells themselves. A small but significant difference. You know how a neurone works? Like a digital computer. It's stimulated

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

by a—a stimulus, fires a signal, and is thereafter inactive for a short time. The next neurone gets the signal, fires, and is also briefly inactivated. Well, it turns out that everything is screwy today. The resistance of the synapses has gone down, the inactivation time is a good many microseconds less, the—oh, hell, let's just say the whole system reacts significantly faster than normally. And the signals are also more intense."

Corinth digested the information briefly. "Looks like you may have stumbled onto something big."

"Onto what? The medium, the apparatus—it's all the same as before. Nothing has changed, I tell you. I got my staff busy and ran routine checks on other samples. They're speeded up too!"

Lewis struck a clenched fist against his temple. "And just when I'd gotten an idea for a testing rig that'd take half the time!"

"I don't see what you're complaining about," said Corinth slowly. "It's not everybody who's lucky enough to find a really new phenomenon. Only—it's odd you should have gotten your bright idea just this morning. Everybody seems to be abnormally smart today."

"Hm?" Lewis glanced sharply up, and Corinth related his casual encounters.

"Odd, yes," nodded the biologist. He rubbed his chin. "Most odd. I wonder—there haven't been any big thunderstorms around here lately, have there? It's pretty well established that ozone stimulates both physical and mental functioning. No—still, we'd better check the atmosphere. Though that doesn't account for my cultures; they're sealed in glass."

Corinth looked around. "Hullo, there's Dagmar. Wonder what's made her so late? Hi, there!" He stood up, waving across the room, and Dagmar Arnulfsen bore her tray over to their table and sat down.

She was a tall, rangy, handsome woman, her long blonde hair drawn tightly around the poised head, but something in her manner—an impersonal energy, an aloofness, perhaps only the unfeminine crispness of speech and dress—made her less attractive than she should have been. She'd changed since the old days, right after the war, thought Corinth. He'd been taking his doctorate at Minnesota, where she was studying journalism, and they'd had fun together; though he'd been too much and too hopelessly in love with his work and another girl to think seriously about her. Afterward they had corresponded, and he had gotten her a secretarial post at the Institute, two years before. She was chief administrative assistant now, and did a good job of it.

"Whew! What a day!" She ran a strong slim hand across her hair, sleeking it down, and

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

smiled wearily at them. "Everybody and his Uncle Oscar is having trouble, and all of them are wishing it on me. When Gertie threw a tantrum—"

"Huh?" Corinth regarded her in some dismay. He'd been counting on the big computer to solve his equations that day. "What's wrong?"

"Only God and Gertie know, and neither one is telling. Allanbee ran a routine test this morning, and it came out wrong. Not much, but enough to throw off anybody that needed precise answers. He's been digging into her ever since, trying to find the trouble, so far without luck. And *I* have to reschedule everybody!"

"Very strange," murmured Lewis.

"Then different instruments, especially in the physics and chemistry sections, are a little crazy. Murchison's polarimeter has an error of—oh, something horrible like one-tenth of one per cent, I don't know."

"*Izzat* so?" Lewis leaned forward, thrusting his jaw out above the dishes. "Maybe it's not my neurones but my instruments that're off whack—no, can't be. Not that much. Nevertheless, I'll have to test them all—" He broke into vigorous German profanity, using terms normally reserved for socialists.

"Me, too," said Corinth.

Dagmar's smile softened. "You looked so hopeful, Pete," she said.

"I had a lovely new approach, but this— Count me in on your remarks, Nat."

"Lots of the boys have come up all at once with brave new projects, too," said Dagmar. "They want immediate use of things like the big centrifuge—well, well, let's just keep plugging."

"All today, eh?" Corinth pushed his dessert aside and took out a cigarette. "'Curiouser and curiouser,'" said Alice. His eyes widened. "Nat, I wonder—"

"A general phenomenon?" Lewis nodded. There was a grimness about his mouth. "Could be, could be. We'd certainly better find out."

"What're you talking about?" asked Dagmar.

"Things." Corinth explained while she finished eating. Lewis sat quietly back, blowing cigar fumes and withdrawn into himself.

"Hm." Dagmar tapped the table with a long, unpainted fingernail. "Sounds—interesting. Are all nerve cells, including those in our own brains, suddenly being speeded up?"

"It's more basic than that," said Corinth. "Something may have happened to—what? Electrochemical phenomena? How should I know? Let's not go off the deep end till we've investigated this."

"Yeah. I'll leave it to you." Dagmar took out a cigarette for herself and inhaled deeply. "I can think of a few obvious

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

things to check up on—hm, never thought I'd think of them so easily, either. But it's your child." She turned to smile again at Corinth, the gentle smile she saved for a very few. "Apropos, how's Sheila?"

"Oh, fine, fine. How's yourself?"

"I'm okay." There was a listlessness in her answer.

"You must come over to our place sometime soon for dinner. We haven't seen you in quite awhile. Bring the new boy friend if you want, whoever he is."

"Jack? Oh, him. I gave him the sack last week. But I'll come over, sure." She got up. "Back to the oars, mates. See you."

Corinth regarded her as she strode toward the cashier's desk. "I wonder why she can't keep a man," he murmured. "She's good-looking and intelligent enough."

"She doesn't want to," said Lewis shortly.

"No, I suppose not. She's turned cold since I knew her in Minneapolis. Why?"

Lewis shrugged.

"I think you know," said Corinth. "You've always understood women better than you had any right to. And she likes you better than anyone else around here, I think."

"We both go for music," said Lewis. It was his opinion that none had been written since 1900. "And we both know how to keep our mouths shut."

"Okay, okay," laughed Corinth. He got up. "I'm for the lab again. Look, let's get some of the others on the phone and divide up the labor, huh? Everybody check something. It won't take long then."

Lewis nodded curtly and followed him out.

By evening the results were in, and Corinth felt a coldness as he looked at the figures.

Electromagnetic phenomena were changed.

It wasn't much, but the very fact that the supposedly eternal constants of nature had shifted was enough to crash a hundred philosophies into dust. The subtlety of the problem held something elemental. How do you re-measure the basic factors when your measuring devices have themselves changed?

Well, there were ways. There are no absolutes in this universe, everything exists in relation to everything else, and it was the fact that certain data had altered relatively to certain other phenomena which was significant.

Corinth had been working on the determination of electrical constants. For the metals they were still the same, or nearly the same, as before, but the resistivity and permittivity of insulators had changed measurably—they had become slightly better conductors. Another team had repeated Michelson's interferometric determination of the velocity of light *in vacuo*. And

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

light was traveling a little faster.

That wrecked a whole cosmos!

Well, not necessarily. Could it be that the Earth had not been in a true vacuum since—well, since Römer's time, or at least since Michelson's? Maybe something, some local strain or force in this small corner of the universe, had hitherto slowed light down. And—hm. Could that account for the red shift of the remoter galaxies? Maybe they weren't receding at all; maybe their light simply decelerated, while keeping the same wavelength, as it entered this part of space, thus lowering its frequency and giving an illusory Doppler effect. In theory that was, of course, impossible, but theory seemed to be going by the board now. Note: have the observatories check on this.

Except in the precision apparatus, such as Gertie the computer, the change in electromagnetic characteristics was not enough to make any noticeable difference. But the most complex and delicately balanced mechanism known to man is the living cell; and the neurone is the most highly evolved and specialized of all cells—particularly that variety of neurones found in the human cerebral cortex. And here the change was felt. The minute electrical impulses which represented neural functioning—sense awareness, motor reaction, thought itself—were flowing more rapidly, more intensely.

And the change might just have begun.

Dagmar shivered. "I need a drink," she said. "Bad."

"I know a bar," said Lewis. "To hell with this noise here. Coming, Pete?"

"I'm going home," said the physicist. "Have fun."

He walked out, hardly aware of the darkened lobby and the late hour.

Well, they'd done all they could for now. They'd checked as many data as possible. Dagmar had gotten in touch with the Bureau of Standards in Washington and turned the whole problem over to them. She gathered, from what the man there said, that a few other laboratories, spotted throughout the country, had also reported anomalies. *Tomorrow,* thought Corinth, *they'll really start hearing about it.*

He bought a newspaper at the corner and glanced at it as he stood there. War, unrest, suspicion, fear and hate and greed, a sick world crumbling—the old story. No mention of the change, that was too big and too new yet.

He was suddenly aware that he had read through the *Times'* crowded front page in about five minutes. He shoved the newspaper into a pocket and strode on.

The city boiled around him,

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

blinking signs, rumbling and hooting traffic, hurrying faceless crowds, buildings arrogant against a sky that was one haze of hectic light. It ground and grumbled in the city, teeth stamping together, lightning down in her iron guts, she was like an elemental force herself. Someone had raised storm and the jinn here, long ago, and left them whirling and shouting and grinding. He looked up and couldn't see the stars. He didn't know if he was glad of that or not, but he hastened toward the subway.

III

There was trouble everywhere. An indignant yell in the morning brought Archie Brock running to the chickenhouse, where Stan Wilmer had set down a bucket of feed to shake his fist at the world.

"Look a' that!" he cried. "Just look!"

Brock craned his neck through the door and whistled. The place was a mess. A couple of bloody-feathered corpses were sprawled on the straw, a few other hens cackled nervously on the roosts, and that was all. The rest were gone.

"What happened?" asked Brock shyly. Wilmer was too angry to notice that his moronic underling had spoken; usually Brock just stood there.

"Oh, my God! The old man's prize Leghorns! They're scattered from here to hell now—all over the woods—"

"Looks like foxes got in when somebody left the door open," said Brock.

"Yeah." Wilmer swallowed his rage in a noisy gulp. "Some stinking lousy son-of-a—"

Brock remembered that Wilmer was in charge of the henhouse, but decided not to mention it. The other man recalled it for himself and paused, scowling.

"I don't know," he said then, slowly. "I checked the place last night as usual, before going to bed, and I'll swear the door was closed and hooked like it always is. Five years I been here and never had any trouble."

"So maybe somebody opened the door later on, after dark, huh?"

"Yeah. A chicken thief. Though it's funny the dogs didn't bark—I never heard of any human being coming here without them yapping." Wilmer shrugged bitterly. "Well, anyway, somebody did open the door."

"And then later on foxes got in." Brock turned one of the dead hens over with his toe. "And maybe had to run for it when one of the dogs came sniffing around, and left these."

"And most of the goddammed birds wandered out into the woods. It'll take a week to catch 'em—all that live. Oh, Judas!" Wilmer stormed out of the chickenhouse, forgetting to close the

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

door. Brock did it for him, vaguely surprised that he had remembered to do so.

He sighed and resumed his morning chores. The animals all seemed fidgety today. And damn if his own head didn't feel funny. He remembered his own panic of two nights before, and the odd way he'd been thinking ever since. Maybe there was some kind of fever going around.

Well—he'd ask somebody about it later. There was work to do today, plowing in the north forty that had just been cleared. All the tractors were busy cultivating, so he'd have to take a team of horses.

That was all right. Brock liked animals, he had always understood them and got along with them better than with people. Not that the people had been mean to him, anyway for a long while now. The kids used to tease him, back when he was a kid too, and then later there'd been some trouble with cars, and a couple of girls had got scared also and he'd been beaten up by the brother of one of them. But that was years back. Mr. Rossman had told him carefully what he could and could not do, kind of taken him over, and things had been all right since then. Now he could walk into the tavern when he was in town and have a beer like anybody else, and the men said hello.

He stood for a minute, wondering why he should be thinking about this when he knew it all so well, and why it should hurt him the way it did. *Hell,* he thought, *I'm all right. I'm not so smart, maybe, but I'm strong. Mr. Rossman says he ain't got a better farmhand nor me.*

He shrugged and entered the barn to get out the horses. He was a young man, of medium height but heavy-set and muscular, with coarse strong features and a round, crew-cut, red-haired head. His blue denim clothes were shabby but clean; Mrs. Bergen, the wife of the general superintendent in whose cottage he had a room, looked after such details for him.

The barn was big and gloomy, full of the strong rich smells of hay and horses. The big Percherons stamped and snorted, restless as he harnessed them. Funny—they were always so calm before. "So, so, steady, boy. Steady, Tom. Whoa, there, Jerry. Easy, easy." They quieted a little and he led them out and hitched them to a post while he went into the shed after the plow.

His dog Joe came frisking around him, a tall Irish setter whose coat was like gold and copper in the sun. Joe was really Mr. Rossman's, of course, but Brock had taken care of him since he was a pup and it was always Brock whom he followed and loved. "Down, boy, down. What the hell's got into you, anyway? Take it easy, will ya?"

The estate lay green around

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

him, the farm buildings on one side, the cottages of the help screened off by trees on another, the many acres of woods behind. There was a lot of lawn and garden and orchard between this farming part and the big white house of the owner, a house which had been mostly empty since Mr. Rossman's daughters had married and his wife had died. He was there now, though, spending a few weeks here in upper New York State with his flowers. Brock wondered why a millionaire like Mr. Rossman wanted to putter around growing roses, even if he was getting old.

The shed door creaked open and Brock went in and took the big plow and wheeled it out, grunting a little with the effort. Not many men could have dragged it out themselves, he thought with a flicker of pride. He chuckled as he saw how the horses stamped at the sight. Horses were lazy beasts, they'd never work if they could get out of it.

He shoved the plow around behind them, carried the tongue forward, and hitched it on. With a deft motion, he twirled the reins loose from the post, took his seat, and shook the lines across the broad rumps. "Gid-dup!"

They just stood, moving their feet.

Tom began backing. "Whoa! Whoa, you ugly devil!"

Jerry came along too. Archie took the loose end of the reins and snapped it with whistling force. Tom grunted and put one huge hoof on the tongue. It broke across.

For a long moment, Brock sat there, finding no words. Then he shook his red head, giving up the problem, and fastened the horses to the post again and unhitched the plow. "It's a ac-ci-dent," he said aloud. The morning seemed very quiet all of a sudden. "It's a ac-ci-dent."

There was a spare tongue in the shed. He fetched it and some tools, and began doggedly removing the broken one.

"Hi, there! Stop! Stop, I say!"

Brock looked up. The squealing and grunting were like a blow. He saw a black streak go by, and then another and another— The pigs were loose!

"Joe!" he yelled, even then wondering a little at how quickly he reacted. "Go get 'em, Joe! Round 'em up, boy!"

The dog was off like burnished lightning. He got ahead of the lead sow and snapped at her. She grunted, turning aside, and he darted after the next. Stan Wilmer came running from the direction of the pen. His face was white.

Brock ran to intercept another pig, turning it, but a fourth one slipped aside and was lost in the woods. It took several confused minutes to chase the majority back into the pen; a number were gone.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Wilmer stood gasping. His voice was raw. "I saw it," he groaned. "Oh, my God, I saw it. It ain't possible."

Brock blew out his cheeks and wiped his face.

"You hear me?" Wilmer grasped his arm. "I saw it, I tell you, saw it with my own eyes. Those pigs opened the gate themselves."

"Naw!" Brock felt his mouth falling open.

"I tell you, I saw it! One of 'em stood up on her hind legs and nosed the latch up. She did it all by herself. And the others were crowding right behind her. Oh, no, no, no!"

Joe came out of the woods, driving a pig before him with sardonic barks. She seemed to give up after a minute and trotted quietly toward the pen. Wilmer turned like a machine and closed the gate again and let her go in.

"Good boy!" Brock patted the silken head that nuzzled against him. "Smart dog!"

"Too damned smart." Wilmer narrowed his eyes. "Did a dog ever make like that before?"

"Sure," said Brock uncertainly.

Joe got off his haunches and went back into the woods.

"I'll bet he's going after another pig." There was a kind of horror in Wilmer's voice.

"Sure. He's a smart dog, he is."

"I'm going to see Bill Bergen about this." Wilmer turned on his heel. Brock looked after him, shrugged heavy shoulders, and went back to his own task. By the time he finished it, Joe had rounded up two more pigs and brought them back.

"Good fellow," said Brock. "I'll see yuh get a bone for this." He hitched Tom and Jerry, who had been standing at their ease. "All right, yuh bums, let's go. Gid-dup!"

Slowly, the horses backed. "Hey!" screamed Brock.

This time they didn't stop with the tongue. Very carefully, they walked on to the plow itself and bent its iron frame with their weight and broke off the coulter. Brock felt his throat dry.

"No," he mumbled.

The horses stood placidly in their tangled harness, watching him. His hands shook, and he had to bite his lip as he approached them. "Take it easy," he said. "Just take it easy. I ain't gonna hurt yuh."

Joe barked and dashed off. Brock's eyes followed him, to see him turn a pig back. So they'd opened the gate again.

"Keep an eye on 'em. Stay there, Joe." Very slowly and carefully, Brock unhitched the horses. They followed him meekly back into the barn, where he put them in their stalls and took off their harness.

They's no harm in 'em, he thought insanely. *They're just lazy. They won't hurt me, because I feed 'em.*

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

He went out and sat down on the ground and held his head between his hands.

Wilmer nearly had a fit when he learned about the horses. Bergen only stood there, shaking his head and whistling tunelessly. "I'll bet it wasn't any man opened that henhouse last night," said Wilmer in a voice that trembled. "I'll bet it was the foxes."

"The hook on the door's too high up for that," said Bergen.

"Not if two or three foxes stood on top of each other. God in heaven, what's happening?"

"I don't know." Bergen scratched his sandy head. "Tell you what. We'll call off all work having to do with animals, except feeding and milking, of course. Padlock every gate and have somebody check all our fence lines. I'll see the old man about this."

"Me, I'm gonna carry a gun," said Wilmer.

"Well, it might not be a bad idea," said Bergen.

Archie Brock was assigned to look at one section, a two-mile line enclosing the woods. He took Joe, who gambolled merrily in his wake, and went off glad to be alone for a change.

How still the forest was! Sunlight slanted down through green unstirring leaves, throwing a dapple on the warm brown shadows. The sky was utterly blue overhead, no clouds, no wind. His feet scrunched dully on an occasional clod or stone, he brushed against a twig and it scratched very faintly along his clothes, otherwise the land was altogether silent. The birds seemed to have quieted down all at once, no squirrels were in sight, even the sheep had withdrawn into the inner woods. He thought uneasily that the whole green world had a somehow waiting feel to it.

He could see how people would be scared if the animals started getting smarter. If they were really smart, would they keep on letting humans lock them up and work them and emasculate them and kill and skin and eat them? Suppose Tom and Jerry, now— But they were so gentle!

And—wait—weren't the people getting smarter too? It seemed like in the last coupl[e] of days they'd been talking m[o]re and it wasn't all about the weather and the neighb[o]rs either, it was about things like who was going to win the next election and why a rear-engine drive was better in a car. They'd always talked like that now and then, sure, but not so much, and they hadn't had so much to say either. Even Mrs. Bergen, he'd seen her reading a magazine, and all she ever did before in her spare time was watch TV.

I'm *getting smarter too!*

The knowledge was like a thunderclap. He stood there for a long while, not moving, and Joe came up and sniffed his hand in a puzzled way.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

I'm getting smarter.

Sure—it had to be. The way he'd been wondering lately, and remembering things, and speaking out when he'd never said anything much before—what else could it be? All the world was getting smart.

He leaned his head against the cool trunk of a tree, listening to the blood roar in his ears. *Please, God, let it be real. Please make me like other people.*

After awhile he went on, checking the fence as he had been told. There was a boiling in him, though, and he had to fight it down.

I can read, he told himself. *Not very good, but they did teach me the al-pha-bet, and I can read a comic book. Maybe I can read a real book now.*

Books had the answers to what he wondered about, things like the sun and moon and stars, why there was winter and summer, why they had wars and Presidents and who lived on the other side of the world and—

He shook his head, unable to grasp the wilderness that rose up inside him and spread till it covered creation further than he could see. He'd never wondered before. Things just happened and were forgotten again. But— He looked at his hands, marveling. *Who am I? What am I doing here?*

In the evening, after chores, he put on a clean suit and went up to the big house. Mr. Rossman was sitting on the porch, smoking a pipe and turning the pages of a book over in his thin fingers, not really seeing it. Brock paused timidly, cap in hand, till the owner looked up and spied him.

"Oh, hello, Archie," he said in his soft voice. "How are you tonight?"

"I'm all right, thank you." Brock twisted the cap between his stumpy fingers and shifted from one foot to another. "Please, can I see you for a minute?"

"Why, of course. Come on in." Mr. Rossman laid his book aside and sat smoking while Brock opened the screen door and walked over to him. "Here, take a chair."

"That's all right, thanks. I—" Brock ran his tongue across dry lips. "I'd just like to ask you 'bout something."

"Ask away, Archie." Mr. Rossman leaned back. He was a tall spare man, his face thinly carved, proud under its kindness of the moment, his hair white. Brock's parents had been tenants of his, and when it became plain that their son would never amount to anything, Rossman had taken charge of the boy. "Everything okay?"

"Well, it's about, uh, about this change here."

"Eh?" Rossman's gaze sharpened. "What change?"

"You know. The animals getting smart and uppity."

"Oh, yes. That." Rossman blew a cloud of smoke. "Tell me,

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Archie, have you noticed any change in yourself?"

"Yes, I, uh, well, I think maybe I have."

Rossman nodded slowly. "You wouldn't have come here if you hadn't changed."

"What's happening, Mr. Rossman? What's gone wrong?"

"I don't know, Archie. Nobody knows." The old man looked out into a gathering blue twilight. "Are you so sure it's wrong, though? Maybe something is finally going right."

"You don't *know*—"

"No. Nobody knows." Rossman's thin blue-veined hand slapped the newspaper on the table beside him. "There are hints here. The knowledge is creeping out. I'm sure much more is known, but the government has suppressed the information for fear of a panic." He grinned with a certain viciousness. "As if a world-wide phenomenon could be kept secret! They'll hang on to their stupidity to the very end, though, in Washington."

"But, Mr. Rossman—" Brock lifted his hands and let them fall again.

"What can we do?"

"Wait. I'm going to the city soon, to find out for myself—those pet brains of mine at the Institute should—"

"Not *leaving?*"

Rossman shook his head, smiling. "Poor Archie. There's a horror in being helpless, isn't there? I sometimes think that's why men fear death—not because of oblivion, but because it's foredoomed, there's nothing they can do to stop it. Even fatalism is a refuge from that, in a way. . . . But I digress, don't I?"

He sat smoking for a long while. The summer dusk chirred and murmured around them. "Yes," he said at last, "I feel it in myself too. And it's not altogether pleasant. I've always imagined myself as a quick, capable, logical thinker. Now something is coming to life within me that I don't understand at all. Sometimes my whole life seems to have been a petty and meaningless scramble. And yet I thought I'd served my dependents and my country well." He smiled once more. "I do hope I'll see the end of this, though. It should be interesting!"

Tears stung Brock's eyes. "What can I do?"

"Do? Live. Live from day to day. What else can a man do?" Rossman got up and put his hand on Brock's shoulder. "But keep on thinking. Keep your thinking close to the ground, where it belongs. Don't take off—just think about real things, daily life, until you get more used to it. Or until—well, no matter." He grimaced. "Our younger security-hungry generation talks about 'new freedom.' It's just trading one set of masters for another. There was a New Deal in Egypt when the Old Kingdom fell, a New Deal

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

in Rome under the Gracchi, and what did it get them? Don't ever trade your liberty for another man's offer to do your thinking for you. I had to play the feudal lord with you, Archie, but it may be that that's no longer necessary."

Brock didn't understand most of it. But it seemed Mr. Rossman was telling him to be cheerful, that this wasn't such a bad thing after all. "I thought maybe I could borrow some books," he said humbly. "I'd like to see if I can read them now."

"Why, of course, Archie. Come on into the library. I'll see if I can find something suitable for you to begin on—"

IV

Conference.

Everybody was working late, and it was ten o'clock before the meeting which Corinth had invited to his place was ready. Sheila had insisted on putting out her usual buffet of sandwiches and coffee; afterward she sat in a corner, talking quietly with Sarah Mandelbaum. Their eyes strayed occasionally to their husbands, who were playing chess, and there was a creeping fear in the gaze.

Corinth was playing better than he had ever done before. Usually he and Mandelbaum were pretty evenly matched, the physicist's slow careful strategy offsetting the unionist's nerve-wracking bravura. But tonight the younger man was too distracted. He made schemes that would have delighted Capablanca, but Mandelbaum saw through them and slashed barbarically past his defenses. Corinth sighed at last and leaned back.

"I concede," he said. "It'd be mate in, uh, seven moves."

"Not so." Mandelbaum pointed a gnarled finger at king's bishop. "If you moved him over here, and then—"

"Oh, yes, you're right. No matter. I'm just not in the mood. What's keeping Nat?"

"He'll be along. Take it easy." Mandelbaum removed himself to an armchair and began stuffing a big-bowled pipe.

"I don't see how you can sit there like that when—"

"When a world's falling to pieces around my ears? Look, Pete, it's been falling apart as long as I can remember. So far, in this particular episode, no guns have come out."

"They may do so yet." Corinth got up and stood looking out the window, hands crossed behind his back and shoulders slumped. The restless glimmer of city light etched him against darkness. "Don't you see, Felix, this new factor—if we survive it at all—changes the whole basis of human life? Our society was built by and for one sort of man. Now man himself is becoming something else."

"I doubt it." The noise of a match, struck against Mandel-

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

baum's shoe, was startlingly loud. "We're still the same old animal."

"What was your I.Q. before the change?"

"I don't know."

"Never took a test?"

"Oh, sure, they made me take one now and then, to get this or that job, but I never asked for the result. What's I.Q. except the score on an I.Q. test?"

"It's more than that. It measures the ability to handle data, grasp and create abstractions—"

"*If* you're a Caucasian of West European - American cultural background. That's who the test was designed for, Pete. A Kalahari bushman would laugh if he knew it omitted water-finding ability. That's more important to him than the ability to juggle numbers. Me, I don't underrate the logic and visualization aspect of personality, but I don't have your touching faith in it either. There's more to a man than that, and a garage mechanic may be a better survivor type than a mathematician."

"Survivor—under what conditions?"

"Any conditions. Adaptability, toughness, quickness—those are the things that count most."

"I think kindness means a lot," said Sheila timidly.

"It's a luxury, I'm afraid, though of course it's such luxuries that make us human," said Mandelbaum. "Kindness to whom? When I stumped for intervention, back in Hitler's time, and when I joined O.S.S. to help liquidate the ba—bum, was that kind? It meant that a lot of people would get hurt. Only in the long run, it would have been harder on the world to let the Nazis live."

Bitterness edged his voice. "You scientists always oversimplify. That's how physics has achieved so much, I guess: by working with a distorted fraction of the real world, and ignoring everything else. I'll give you a for instance, even if it is rather personal. One of my sons is in Chicago now. He changed his name and had his nose bobbed. He's not ashamed of his parents, no, but he's saved himself and his family a lot of trouble and humiliation. And—well—I honestly don't know whether to admire him for tough-minded adaptability, or call him a spineless whelp. Is there any simple yes-or-no answer to that question?"

"We're getting rather far from the point," said Corinth, embarrassed. "It's a matter of estimating what we, the world, are in for."

He shook his head. "It feels strange. My I.Q. has gone from its former 160 to about 200 in a week. I'm thinking things that never occurred to me before. My former professional problems are becoming ridiculously easy. My mind keeps wandering off into the most fantastic trains of thought, some of them pretty

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

wild and morbid. I'm nervous as a kitten, jump at shadows, afraid for no good reason at all. Now and then I get flashes where everything seems grotesque—like in a nightmare."

"You're not adjusted to your new brain power yet, that's all," said Sarah.

"I feel the way Pete does," said Sheila. "It isn't worth it."

The other woman shrugged, spreading her hands. "Me, I think it's kind of fun."

"Matter of basic personality, which has *not* changed," said Mandelbaum. "Sarah's always been a pretty down-to-earth sort. You just don't take your new mind seriously, Liebchen. To you, the power of abstract thought is a toy. It's got little to do with the serious matters of housework." He puffed, meshing his face into wrinkles as he squinted through the smoke. "And me, I feel the sort of things you do, Pete, but I don't let it bother me. Haven't time for such fumblydiddles, not the way things are now. Everybody in the union seems to have come up with some crank notion of how we—and that could be anybody from the local office to the Almighty—ought to run things."

"Sure," said Corinth. "The average man—" He stopped as the doorbell rang. "That must be them now. Come in."

Dagmar Arnulfsen entered, her slim height briefly concealing Nathan Lewis' bulk. She looked as cool and smooth and hard as before, but there were shadows under her eyes. "Hullo," she said tonelessly.

"No fun, huh?" asked Sheila with sympathy.

Dagmar grimaced. "Dreams."

"Me too." A shudder ran along Sheila's small form.

"How about the psych man you were going to bring, Nat?" asked Corinth.

"He refused at the last minute," said Lewis. "Had some kind of idea for a new intelligence test. And his partner was too busy putting rats through mazes. Never mind, I think we can dispense with them." He wandered over to the buffet and picked up a sandwich and bit into it. "Mmmmm—*delikat*. Sheila, why don't you ditch this long drink of water and marry me?"

"Trade him for a long drink of beer?" she smiled.

"*Touché!* You've changed too, haven't you? But really, you might have done better by me. A long drink of Scotch, at the very least. King's Ransom or Ambassador by choice."

"After all," said Corinth gloomily, "it's not as if we were here for any special purpose. I just thought a general discussion would clarify the matter in all our minds and maybe give us some ideas."

"What's the world news?" asked Lewis, settling himself near the table. "I've been too busy to keep up."

"Not much different yet," said

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Dagmar. "These things take time to generate their effects. There was a rather sensible proposal for settling international tension made in the U.N. the other day; riots in Calcutta, questions asked in the House of Commons, a new chiliastic prophet out in Los Angeles. And oh, yes, the stock market tumbling in Wall Street. And the papers are full of this and that story about clever things done by animals." She lit a cigarette, sucking in her cheeks and half closing her eyes. "That seems to be about all so far which could be attributed to this—intelligence phenomenon."

"Censorship on the facts, eh?"

"Apparently." She shrugged flawlessly tailored shoulders. "There have been a few stories, of course, mostly of the Sunday-supplement type, but American papers, at least, are sitting pretty tight on the big news."

"The lid's going to blow off soon," said Corinth. "They're just stalling for time, hoping something can be done. You can't suppress something that every man on Earth is noticing in his neighbors and himself."

"There was a clever piece of misdirection in one paper today," ventured Sheila. "About—what's his name?—Huntington's theory that ozone may make people smarter. Also a lot about sunspots. The whole thing gave the impression that this is just temporary and unimportant."

"John Rossman's in Washington now," said Dagmar. She added to the Mandelbaums: "He came to the Institute a few days back, asked our bright boys to investigate this business but keep their findings confidential, and flew to the capital. With his pull, he'll get the whole story if anyone can."

"I don't think there is much of a story, to tell the truth," said Mandelbaum. "Not yet."

"Just you wait," said Lewis cheerfully. He took another sandwich and a cup of coffee. "I predict that within about one week, things are going to start going to hell in a handbasket."

"The fact is—" Corinth got out of the chair into which he had flopped and began pacing the room. "The fact is, that the change isn't over. It's still going on. As far as our best measurements can tell—though they're not too exact, what with our instruments being affected themselves—the change is even accelerating."

"Within the limits of error, I think I see a more or less hyperbolic advance," said Lewis. "We've just begun, brethren. The way we're going, we'll all have I.Q.'s in the neighborhood of 400 within another week."

They sat for a long while, not speaking. Corinth stood with his fists clenched, hanging loose at his sides, and Sheila gave a little wordless cry and ran over to him and hung on his arm. Mandelbaum blew clouds of

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

smoke, scowling as he digested the information; one hand stole out to caress Sarah's, and she squeezed it gratefully. Lewis grinned around his sandwich and went on eating. Dagmar sat without motion, the long clean curves of her face gone utterly expressionless. The city banged faintly below them, around them.

"What's going to happen?" breathed Sheila at last. She trembled so they could see it. "What's going to happen to us?"

"God alone knows," said Lewis, not without gentleness.

"Will it go on building up forever?" asked Sarah.

"Nope," said Lewis. "Can't. It's a matter of neurone chains increasing their speed of reaction, and the intensity of the signals they carry. The physical structure of the cell can take only so much. If they're stimulated too far—insanity, followed by idiocy, followed by death."

"How high can we go?" asked Mandelbaum practically.

"Can't say. For one thing, normal nervous processes are too little understood, and for another, nothing at all, really, is known about this new phenomenon. What brought it on? I can't tell you. How does it work? I can't tell you that either. And anyway—" Lewis took out a cigar and bit off the end. "Anyway, my friends, the I.Q. is a limited and comparative measurement which becomes quite meaningless when it gets outside the range for which the tests were designed. To speak of an I.Q. of 400 just doesn't make sense. Intelligence of that speed and scope may not be intelligence at all as we know it; it may become something entirely different."

"Good God!" Corinth had had an idea that the change was on the increase, but had been too busy with his own work of physical measurements to know what Lewis' department had found out. The appalling realization was only beginning to grow on him. "Oh, my Lord!"

Dagmar grinned without much humor. "You know what a lot of people are going to say," she put in. "Them scientists should'a left well enough alone. They shouldn't'a started monkeying around with that there atomic bomb. Let's lynch 'em."

"It's not of human origin, this," said Lewis seriously. "It's cosmic."

"I know. But does the much-touted Common Man?"

"He's got more sense than you think," said Mandelbaum evenly. "You theorists who make the average man—a non-existent invention in the first place—either a hero or a lout, should get out and meet some workers sometime. If the human race is biologically able to survive this, the plain man will come through."

"I wonder," said Corinth. "Sheer social inertia has carried us along so far. People continue

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

in their daily rounds because there's nothing else available. But when things really start changing—"

"Oh, sure, Pete, it won't be an easy time," said Mandelbaum. "I agree we're in for a rough transition. But that's no excuse for sitting down and bewailing something we can't change. What counts is a sensible program of action."

He knocked out his pipe and went over to get some coffee. "What we need is an interim organization which can see us through the next few months. It'll probably have to be on a local level. I do agree that human society as it is can't survive a change in the nature of humanity, and it's quite possible that the national government will break down."

"The janitor and the elevator man at the Institute quit yesterday," said Dagmar. "Said the work was too monotonous. What happens when all the janitors and garbage men and ditch-diggers and assembly-line workers decide to quit?"

"That's part of it," nodded Mandelbaum. "Though they won't all do it. Some will be afraid, some will have the sense to see that we've got to keep going, some—well, there's no simple answer to this."

"Too many unknowns for a prediction," assented Lewis.

"You haven't any idea as to the cause of the change?" asked Dagmar.

"Oh, yes," said Lewis. "Any number of ideas, and no way of choosing between them. We'll just have to study and think some more, that's all."

"It's a physical phenomenon embracing at least the whole Solar System," declared Corinth. "The observatories have established that much. It may be that the sun, in its orbit around the center of the galaxy, has entered some kind of force-field. But on theoretical grounds—dammit, I won't scrap general relativity till I have to! — on theoretical grounds, I'm inclined to think it's likely a matter of our having *left* a force-field which slows down light and otherwise affects electromagnetic and electrochemical processes."

"In other words," said Mandelbaum slowly, "we're actually entering a normal state of affairs? All our past has been spent under abnormal conditions?"

"Maybe. Only, of course, those conditions are normal for us. We've evolved under them. We may be like deep-sea fish, which explode when they're brought up to ordinary pressures."

"Heh! Pleasant thought."

"I don't think I'm afraid to die," said Sheila in a small voice, "but being *changed* like this—"

"Keep a tight rein on yourself," said Lewis sharply. "I suspect this unbalance is going to drive a lot of people insane. Don't be one of them."

He knocked the ash off his

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

cigar. "We have found out some things at the lab," he went on in a dispassionate tone. "As Pete says, it's a physical thing, either a force-field or the lack of one, affecting electronic interactions. The effect is actually rather small, quantitatively. Ordinary chemical reactions go on pretty much as before, in fact I don't think any significant change in the speed of organic reactions has been detected. But the more complex and delicate a structure is, the more it feels that slight effect.

"You must have noticed that you're more energetic lately. We've tested basal metabolism rates, and they have increased, not much but some. Your motor reactions are faster too, though you may not have noticed that because your subjective time sense is also speeded up. In other words, not much change in muscular, glandular, vascular, and the other somatic functions, just enough to make you feel nervous; and you'll adjust to that pretty quick.

"On the other hand, the most highly organized cells—neurones, and above all the neurones of the cerebral cortex—are very much affected. Perception speeds are way up; they measured that over in psych. You've noticed, I'm sure, how much faster you read than before. Reaction time to all stimuli is less."

"I heard that from Jones," nodded Dagmar coolly, "and checked up on traffic accident statistics for the past week. They're significantly lower. If people react faster, naturally they're better drivers."

"Uh-huh," said Lewis. "Till they start getting tired of poking along at sixty miles an hour and drive at a hundred. Then you may not have any more crackups, but those you do have —wham!"

"But if people are smarter," began Sheila, "they'll know enough to—"

"Sorry, no." Mandelbaum shook his head. "Basic personality does not change, right? And intelligent people have always done some pretty stupid or evil things from time to time, just like everybody else. A man might be a brilliant scientist, let's say, but that doesn't stop him from neglecting his health or driving recklessly for a thrill or—"

"Or voting Democrat," nodded Lewis, grinning. "That's correct, Felix. Eventually, no doubt, increased intelligence would react on the whole personality, but right now you're not changing anyone's weaknesses, ignorances, prejudices, blind spots, or ambitions; you're just giving him more power, of energy and intelligence, to indulge them."

His voice became dry and didactic: "Getting back to where we were, the most highly organized tissue in the world is, of course, the human cerebrum, the gray matter or seat of consciousness if you like. It feels the stimulus—or the lack of in-

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

hibition, if Pete's theory is right—more than anything else on Earth. Its functioning increases out of all proportion to every other part of the organism. Maybe you don't know how complex a structure the human brain is. Believe me, it makes the sidereal universe look like a child's building set. There are many times more possible interneuronic connections than there are atoms in the entire cosmos—the factor is something like ten to the power of several million. It's not surprising that a slight change in electrochemistry—too slight to make any important difference to the rest of the organism—will change the whole nature of the mind. Look what a little dope or alcohol will do, and then remember that this new factor works on the very basis of the cell's existence. The really interesting question is whether so finely balanced a function can survive such a change at all."

"Well," said Corinth grayly, "we'll know pretty soon."

"How can you just sit there and talk about it that way?" cried Sheila. There was horror in her tone.

"My dear girl," said Dagmar coolly, "do you imagine we can, at this stage, do anything else?"

V

Selections from the *New York Times* June 23:

PRESIDENT DENIES DANGER IN BRAIN SPEEDUP

'Keep Cool, Stay on Job,' Advises White House—No Harm to Humans in Change

U.S. Scientists Working on Problem—Expect Answer Soon

—

FALLING STOCK MARKET WORRIES WALL STREET

—

Declining Sales Bring Down Stock Market and Prices

U.S. in Danger of Recession, Says Economist

—

CHINESE TROOPS MUTINY IN INDO-CHINA

—

Communist Government Declares Emergency

—

PALACE REVOLUTION IN SPAIN

—

Moorish Guard Ousts Government—Proclaims Spain a Caliphate Under Sidi Hassan

Call on Moslem World to Unite

—

NEW THEORY OF RELATIVITY ANNOUNCED

—

Rhayader Revises Einstein's Work—Believes Interstellar Travel a Theoretical Possibility

—

NEW RELIGION FOUNDED IN LOS ANGELES

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Sawyer Proclaims Self
'The Third Ba'al'
—Thousands Attend Mass
Meeting

—

FESSENDEN CALLS FOR
WORLD GOVERNMENT

—

Iowa Isolationist Reverses
Stand in Senate Speech

—

JOHNSON SAYS
WORLD GOVERNMENT
IMPRACTICAL
AT PRESENT TIME

—

Oregon Senator Reverses
Former Stand

—

REBELLION IN UPSTATE
HOME FOR
FEEBLE-MINDED

—

REVOLUTION IN
NICARAGUA

—

CHILD STARTS FIRE
DEVASTATING
WISCONSIN TOWN

It was one of their last issues.

Brock thought it was strange to be left in charge of the estate. But a lot of funny things had been happening lately.

First Mr. Rossman had gone. That was not unusual, though the reason this time was certainly new. Then, the very next day, Stan Wilmer had been attacked by the pigs when he went in to feed them. They charged him, grunting and squealing, stamping him down under their heavy bodies, and several had to be shot before they left him. Most had rushed the fence then, hitting it together and breaking through and disappearing into the woods. Wilmer was pretty badly hurt and had to be taken to the hospital; he swore he'd never come back.

Brock was in too much of a daze, too full of the change within himself, to care. He didn't have much to do, anyway, now that all work except the most essential was suspended. He looked after the animals, careful to treat them well and to wear a gun at his hip, and had little trouble. Joe was always beside him. The rest of the time he sat around reading, or just with his chin in his hand to think.

Bill Bergen called him in a couple of days after the pig episode. The overseer didn't seem to have changed much, not outwardly. He was still tall and sandy and slow-spoken, with the same toothpick worried between his lips, the same squinted pale eyes. But he spoke even more slowly and cautiously than he had done before to Brock—or did it only seem that way?

"Well, Archie," he said, "Rogers just quit."

Brock shifted from one foot to another, looking at the floor.

"Said he wanted to go to college. I couldn't talk him out of it." Bergen's voice held a faintly amused contempt. "The idiot. There won't *be* any more col-

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

leges in another month. That leaves just you and my wife and Voss and me."

"Kind of short-handed," mumbled Brock, feeling he ought to say something.

"One man can do the bare essentials if he must," said Bergen. "Lucky it's summer. The horses and cows can stay outdoors, which saves barn cleaning."

"How about the crops?"

"Not much to do there yet. To hell with them, anyway."

Brock stared upward. In all his years on the place, Bergen had been the steadiest and hardest worker they had.

"You've gotten smart like the rest of us, haven't you, Archie?" asked Bergen. "I daresay you're about up to normal now—prechange normal, I mean."

Brock's face grew hot.

"Sorry, I didn't mean anything personal. You're a good man." Bergen's voice was growing dreamy now, he spoke as if from very far away. "Let me ask you a question. Little brain teaser. You got an island four feet on a side in the middle of a square lake twenty feet on a side. You want to get over to the island without swimming, and you've got two boards, each six feet long. It's eight feet from the lakeshore to the island, remember. How do you get across?"

"Why, uh, nail the boards together—"

"No nails."

Well, uh, let's see—" Brock scratched his head, squinting with concentration. "I, gee, I dunno—Oh, yes. I got it. Lay one board across a corner of the lake. Lay the other one from the middle of the first one to the corner of the island. That's it, I think."

"You'll do," said Bergen. He sat for a moment fiddling with the papers on his desk. Then: "Okay, Archie, you're in charge here now."

"*Huh?*"

"I'm leaving too."

"But, Bill—you can't—"

"Can and will, Archie." Bergen stood up. "You know, my wife always wanted to travel, and I have some things to think out. Never mind what they are, it's something I've puzzled over for many years and now I believe I see an answer. We're taking our car and heading west."

"But—but—Mr. Rossman—he's de-pen-ding on you, Bill—"

"I'm afraid that there are more important things in life than Mr. Rossman's country retreat," said Bergen evenly. "You can handle the place all right, even if Voss leaves too."

Fright and bewilderment lashed into scorn: "Scared of the animals, huh?"

"Why, no, Archie. Always remember that you're still brighter than they are, and what's more important, you have hands. A gun will stop anything." Bergen walked over to the window and looked out. It was a bright windy

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

day with sunlight torn in the restless branches of trees. "As a matter of fact," he went on in the same gentle, remote tone, "a farm is safer than any other place I can think of. If the production and distribution systems break down, as they may, you'll still have something to eat. But my wife and I aren't getting any younger. I've been a steady, sober, conscientious man all my life. Now I wonder what all the fuss and the lost years were about."

He turned his back. "Goodbye, Archie." It was a command.

Brock went out into the yard, shaking his head and muttering to himself. Joe whined uneasily and nuzzled his palm. He ruffled the golden fur and sat down on a bench and put his head in his hands.

The trouble is, he thought, *that while the animals and I got smarter, so did everybody else. God in heaven—what sort of things are going on inside Bill Bergen's skull?*

It was a terrifying concept. The speed and scope and sharpness of his own mind were suddenly cruel. He dared not think what a normal human might be like by now.

Only it was hard to realize. Bergen hadn't become a god. His eyes didn't blaze, his voice was not vibrant and resolute, he didn't start building great engines that flamed and roared. He was still a tall stoop-shouldered man with a weary face and a patient drawl, nothing else. The trees were still green, a bird chattered behind a rosebush, a fly rested cobalt-blue on the arm of the bench.

Brock remembered, vaguely, sermons from the few times he had been in church. The end of the world—was the sky going to open up, would the angels pour down the vials of wrath on a shaking land, and would God appear to judge the sons of man? He listened for the noise of great galloping hoofs, but there was only the wind in the trees.

That was the worst of it. The sky didn't care. The Earth went on turning through an endlessness of dark and silence, and what happened in the thin scum seething over its crust didn't matter.

Nobody cared. It wasn't important.

Brock looked at his scuffed shoes and then at the strong hairy hands between his knees. They seemed impossibly alien, the hands of a stranger. *Sweet Lord,* he thought, *is this really happening to me?*

He grabbed Joe by the ruffed neck and held him close. Suddenly he had a wild need for a woman. It wasn't that he had the old hunger for her, not that, he just wanted someone to hold him and talk to him and block out the loneliness of the sky.

He got up, sweat cold on his body, and walked over to the

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Bergens' cottage. It was his now, he supposed.

Voss was a young fellow, a kid from town who wasn't very bright and hadn't been able to find any other employment. He looked moodily up from a book as the other man entered the small living room.

"Well," said Brock, "Bill just quit."

"I know," said Voss. "What're we gonna do?"

"Stay here." Brock shrugged, aware that Voss was scared and weak and willing to surrender leadership. Bergen must have foreseen that. The sense of responsibility was strengthening.

"We'll be all right if we stay here," said Brock. "Just wait it out, keep going, that's all."

"The animals—"

"You got a gun, don't you? Anyway, they'll know when they're well off. Just be careful, always lock the gates behind you, treat 'em good—"

"I'm not gonna wait on any damn animals," said Voss sullenly.

"That you are, though." Brock went over to the icebox and took out two cans of beer and opened them.

"Look here, I'm smarter than you are, and—"

"And I'm stronger'n you. If you don't like it, you can quit. I'm staying." Brock gave Voss one can of beer and tilted the other to his mouth.

"Look," he said after a moment, "I know those animals. They're mostly habit. They'll stick around because they don't know any better and because we feed 'em and because—uh—respect for man has been drilled into 'em. There ain't no bears or wolves in the woods, nothing that can give us trouble except maybe the pigs. Me, I'd be more scared to be in a city."

"How come?" Despite himself, Voss was overmastered. He laid down the book and took up his beer. Brock glanced at the title—*Night of Passion*, in a two-bit edition. Voss might have gained a better mind, but that didn't change him otherwise. He just didn't *want* to think.

"The people," said Brock. "God knows what they'll do." He went over to the radio and turned it on and presently got a newscast. It didn't mean much to him; mostly it was about the wave of new brain power, but the words were strung together in a way that didn't make a lot of sense. The voice sounded frightened, though.

After lunch, Brock decided to take a scout through the woods and see if he couldn't locate the pigs and find what they were up to. They worried him more than he would admit. They could perfectly well take care of themselves in the wild, and they seemed to have realized what man did to them, keeping them penned in their own filth and killing and maiming them at his pleasure. Pigs had always been smarter than most people knew

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

They might also get to thinking about the stores of feed kept on a farm watched by only two men.

"Of course," he said aloud to Joe, "they ain't got a language. They couldn't'a learned English yet, and I don't think those grunts and squeals ever meant much. Still, I dunno. And they might not need a language anyway."

The dog thumped his tail on the ground. Brock wondered how much he really knew.

Voss wasn't even asked to come; he'd have refused, and in any event it was wise to keep one man on guard at home. Brock and Joe went over the fence and into the hundred acres of forest alone.

It was green and shadowy and full of rustling in there. Brock went quietly, a rifle under one arm, parting the underbrush before him with habitual ease. He saw no squirrels, though they were ordinarily plentiful. Well —they must have thought it out, the way crows had done long ago, and seen that a man with a gun was something to stay away from. He wondered how many eyes were watching him, and what was going on behind the eyes. Joe stuck close to his heels, not bounding on all sides as he normally did.

An overlooked branch slapped viciously at the man's face. He stood for an instant of creeping fear. Were the trees thinking too, now?

No—After a moment he got control of himself and went stolidly on along the sheep trail. To be changed by this—whatever-it-was—a thing had to be able to think in the first place. Trees had no brains. He seemed to recall hearing once that insects didn't either, and made a note to check up on this. Good thing that Mr. Rossman had a big library.

And a good thing, Brock realized, that he himself was steady. He had never gotten too excited about anything, and was taking the new order more calmly than seemed possible. One thing at a time, that was it. Just go along from day to day, doing as much as he could to stay alive.

The thicket parted before him and a pig looked out. It was an old black boar, a big mean-looking creature which stood immovably in his path. The snouted face was a mask, but Brock had never seen anything so cold as his eyes. Joe bristled, growling, and Brock lifted the rifle. They stood that way for a long time, not moving. Then the boar grunted—it seemed contemptuous—and turned and slipped into the shadows. Brock realized that his body was wet.

He forced himself to go on for a couple of hours, ranging the woods but seeing little. When he came back, he was sunk in thought. The animals had changed, all right, but he had no way of telling how much,

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

or what they would do next. Maybe nothing.

"I been on the phone," said Voss when he entered the cottage. "Called up the neighboring farms and the town. Most people are just sitting tight, trying to organize something. A lot have left, though, nobody knows where."

"Yeah," grunted Brock.

"I been thinking. Maybe we should move in with another farmer. Ralph Martinson invited us to. He needs extra help, now his hired man has quit."

"I'm staying."

Voss gave him a cool glance. "Because you don't want to go back to being a moron, huh?"

Brock winced, but made his answer flat. "Call it what you like."

"I'm not going to stay here forever."

"Nobody asked you to. Come on, it's about time for the milking."

"Judas, what'll we do with the milk from thirty cows? The creamery truck ain't come around for three days."

"Mmmm—yeah—Well, I'll figger out something. Right now, we can't let 'em bust their udders."

"Can't we just?" muttered Voss, but followed him out to the barn.

Milking thirty cows was a big job, even with a couple of machines to help. Brock decided to dry up most of them, but that would take some time; you had to taper them off gradually. Meanwhile they were restless and hard to control.

He came out and took a pitchfork and began throwing hay over the fence to the sheep, which had flocked in from the woods as usual. Halfway through the job, he was roused by Joe's wild yammer. He turned and saw the farm's enormous Holstein bull approaching.

He's loose! Brock's hand went to the pistol at his belt, then back to his fork. A popgun wasn't much use against such a monster. The bull snorted, pawing the ground and shaking his horn-cropped head.

"Okay, fella." Brock went slowly toward him, wiping sandy lips with his tongue. The noise of his heart was loud in his ears. "Okay, easy, back to the pen with yuh."

Joe snarled, stiff-legged beside his master. The bull lowered his head and charged.

Brock braced himself. The giant before him seemed to fill the sky. At the last moment, he flicked aside. Joe sprang, closing his teeth on the sensitive nose. The bull bellowed and shook the dog loose. Blood ran from his torn nostrils. Whirling, incredibly fast for his bulk, he rushed down on the man again.

Brock stabbed under the jaw. It was a mistake, he realized wildly; he should have gone for the eyes. The fork ripped out of his hands and he felt a blow that knocked him to the ground.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

The bull ground his head against Brock's chest, trying to gore with horns that weren't there.

Suddenly he bellowed again. There was a horror of pain in his voice. Joe had come behind him and fastened jaws in the right place. The bull turned, one hoof grating along Brock's ribs. The man got his gun out and fired from the ground. The bull began to run. Brock rolled over, scrambled to his feet, and sprang alongside the great head. He put the pistol behind one ear and fired. The bull stumbled, falling to his knees. Brock took closer aim and fired again.

After that he collapsed on the body, whirling toward darkness. Joe sprang to lick his face and bark frantically.

Brock came to as Voss shook him. "Oooo-ough! Lemme go, will ya?"

He stumbled erect, leaning on the other man. "Are yuh hurt, Archie?" The words gibbered meaninglessly on his ears. "Are yuh hurt?"

Brock let Voss lead him into the cottage. After a stiff drink he felt better and inspected himself. "I'm all right," he muttered. "Bruises and cuts, no bones broke. I'm okay."

"That settles it." Voss was shaking worse than Brock. "We are leaving here."

The red head shook. "No."

"Are you crazy? Alone here, all the animals running wild, everything gone to hell—are you crazy?"

"I'm staying."

"I'm not! I got half a mind to make you come along."

Joe growled. "Don't," said Brock. He felt, suddenly, only an immense weariness. "You go if you want to, but leave me. I'll be all right."

"Well—"

"I'll herd some of the stock over to Martinson's tomorrow, if he'll take 'em. I can handle the rest myself."

Voss argued for awhile longer, then gave up and took the jeep and drove away. Brock smiled without quite knowing why he did.

He checked the bull's pen. The gate had been broken down by a determined push. Half the power of fences had always lain in the fact that animals didn't know enough to keep shoving at them. Well, now they did, it seemed.

"I'll have to bury that fellow with a bulldozer," said Brock. It was becoming more and more natural for him to speak aloud to Joe. "Do it tomorrow. Let's have supper, boy, and then we'll read and play some music. We're alone now, I guess."

VI

A city was an organism, but Corinth had never appreciated its intricate and precarious equilibrium before. Now, with the balance gone, New York was sliding swiftly toward disruption and death.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Only a few subways were running, an emergency system manned by those devoted enough to stay by a job which had become altogether flat and distasteful. The stations were hollow and dark, filthy with unswept litter, and the shrieking of wheels held a tormented loneliness. Corinth walked to work, along dirty streets whose traffic had fallen to a reckless fragment of the old steady river. The highways had been jammed a few days back, people fleeing a city they thought was doomed. Maybe they were right—but it was saddening to think that a multiplied intelligence had not quenched such mob panic.

There was still gas and electricity, but garbage disposal had become a problem for the individual. Food still trickled in from the country, but you had to take what you could get and pay exorbitantly. The riots in Harlem last week had started a fire which devastated most of the area—though people had remained cool enough, on the whole, for the casualty list to be small.

Only—how long could it keep going? How long could a few men serve a population of millions—a mostly non-working population, thrown out of employment by the swiftest and most catastrophic depression of history?

I wonder, thought Corinth in a flashing instant, *exactly what it was that ruined our economy. Partly, of course, it was the breakdown of advertising; suddenly the accepted means of creating demand were laughable and there wasn't time to invent new ones. Then there was the panic, everybody drawing into their shell and waiting fearfully for an unknown tomorrow. And there was the huge refusal of labor to stay with jobs totally unsatisfying to a heightened intellect—not everybody quit, but enough did to dislocate everything, the whole web of production, transportation, communication, and distribution on which our civilization was based. And there were, and are, the disorders all over the nation, messianic religions, revolutionary ideologies, an orgy of destruction which is only beginning to get underway. It's too intricate, too big. Even now I can't foresee—*

A taxi rounded a corner on two wheels, sideswiped a parked car, and was gone in a burst of noise. Another automobile crept slowly down the street, the driver tight-faced, his passenger holding a shotgun. Fear. The shops were boarded up on either side; one small grocery remained open and its proprietor carried a pistol at his belt. In the dingy entrance to an apartment house, an old man sat reading Kant's *Critique* with a strange and frantic hunger which ignored the world around him.

"Mister, I haven't eaten for two days."

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Corinth looked at the ragged shape which had slunk out of an alley. "Sorry," he answered. "I've only got ten bucks on me. Barely enough for a meal at present prices."

"Man, I can't find work—"

"Go to City Hall, friend. They'll give you a job and see that you're fed."

"That outfit? Sweeping streets, hauling garbage, trucking in food—I'd starve first."

"Starve, then," spat Corinth, and went on more swiftly. The weight of the revolver dragging down his coat pocket was comforting. He had little sympathy for that type, after what he had seen.

Though could you expect anything different? You take a typical human, a worker in factory or office, his mind dulled to a collection of verbal reflexes, his future a day-to-day plodding which offered him no more than a chance to fill his belly and be anesthesized by a movie and his television—more and better automobiles, more and brighter plastics, onward and upward with the American Way of Life. Even before the change, there had been an inward hollowness in Western civilization, an unconscious realization that there ought to be more in life than one's own ephemeral self—and the ideal had not been forthcoming. The American, like every ordinary citizen of every nation on earth, had accepted his role without thinking about it, had realized correctly enough that he was among the wealthiest and freest humans who lived; but it had not aroused much enthusiasm in him; it had offered him nothing he did not already possess. Mankind wants a cause, and mid-century America had been in the interregnum, between the death of old gods and the birth of new ones.

Then suddenly, almost overnight, human intelligence had exploded toward fantastic new heights. An entire new cosmos opened before this man; visions, realizations, thought boiling unbidden within him. He saw the miserable inadequacy of his life, the triviality of his work, the narrow and meaningless limits of his beliefs and conventions—and he resigned.

Suppose a human born with subnormal intelligence had been adopted by a group of apes and lived many years with them. Suddenly his mind was brought to the standard for his species. Would he be content to remain a searcher of fruits, a scratcher after fleas, a sleeper and copulator and nothing else? Hardly. And yet, without true men around to show him what he ought to be, he would remain unhappy, undecided, not knowing what plagued him; most likely he would go off alone and brood inchoately over his sorrow.

Not everyone left, of course—not even the majority. But

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

enough people did to throw the whole structure of technological civilization out of gear. Add to that the other disturbances, and—

A naked woman walked down the street, carrying a market basket. She had set out to think for herself, Corinth imagined, and had decided that clothes in summer were ridiculous, and had taken advantage of the fact that the police had other worries to shed hers. No harm in that *per se*, but as a symptom it made him shiver. Any society was necessarily founded on certain more or less arbitrary rules and restrictions. Too many people had suddenly realized that the laws *were* arbitrary, without intrinsic significance, and had proceeded to violate whichever ones they didn't like. The consequences lay before him.

Sheer survival was still basic, of course. In time, people would understand that they had to keep some kind of economy going until a new basis for society could be worked out. But meanwhile anything could happen.

A young man sat on a doorstep, his arms clasped about knees drawn up under his chin, rocking to and fro and whimpering softly. Corinth stopped. "What's wrong?" he asked.

"Fear." The eyes were bright and glazed. "I suddenly realized it. I am alone."

Corinth knew what he would say next, but the man went on, his words blurred with panic: "All I know, all I am, is here, in my head. Everything exists for me only as I know it. And someday I'm going to die." A line of spittle ran from one corner of his mouth. "Someday the great darkness will come, I will not be—*nothing* will be! You may still exist, for you (though how can I tell that you aren't just a dream of mine?)—but for me there will be nothing, nothing, nothing. I will never even have been." The weak tears dribbled out of his eyes, and Corinth went on.

Insanity—yes, that had a lot to do with the collapse. There must be millions of people who had not been able to stand that sudden range and sharpness of comprehension. They hadn't been able to handle their new power, and it had driven them mad.

He shuddered in the hot still air.

The Institute was like a haven. When he walked in, a man sat on guard—submachine-gun lying beside his chair, chemistry text on his lap. The face that lifted to Corinth's was serene. "Hullo."

"Had any trouble, Jim?"

"Not yet. But you never can tell, with all the prowlers and fanatics. And this place is maybe the most important spot in the city. In the world, for all I know."

Corinth nodded, feeling some of the clamminess leave him. There were still rational men;

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

and the sane today were those who did not go kiting off after suddenly perceived stars, but stuck quietly to the immediate work.

The elevator attendant was a seven-year-old boy, son of a man in the Institute; schools were closed. He was a bright, cheery lad, awestruck in the presence of the scientists even while he studied Maxwell's and Einstein's works. Corinth answered several technical questions for him while they went up to the seventh floor.

Lewis was in his laboratory, waiting for him. "Late," he grunted.

"Sheila," replied Corinth.

The conversation here was rapidly becoming a new language. The old way of speech was too slow and cumbersome, loaded with redundancies, ignorant of a thousand subtle possibilities. When your mind was of quadrupled capability, a single word, a gesture of hand, a flicker of expression, could convey whole paragraphs of grammatical English. It would be hopeless to render the talk of post-change humanity literally; it would be quite meaningless to one who still thought in pre-change terms. One must try to give the equivalent meanings, as nearly as possible, and that is often not very near.

"You're late this morning," Lewis had meant. "Have any trouble?"

"I got started late because of Sheila," Corinth had told him. "She's not taking this well at all, Nat—frankly, I'm worried about her. Only what can I do? I don't understand human psychology any more, it's changing too much and too fast. Nobody does. We're all becoming strangers to each other—to ourselves—and it's frightening."

"It'll stabilize," implied Lewis. "Our nervous systems are still adjusting to the new conditions. And once they've done so, we'll have to explore a whole new world of human reaction. Meanwhile, we can only keep going." His heavy body moved forward. "Come on. Rossman's here and wants a confab with us."

They went down the corridor, leaving Johansson and Grunewald immersed in their work: measuring the changed constants of nature, recalibrating instruments, performing all the enormous basic work of science again from the ground up. It was going rapidly for them, not only because of heightened ingenuity but because the essential things to do were, after all, known. Still, the sheer physical motion involved took time.

The rest of the building seemed to crackle with intensity as the other departments mapped out the altered face of their own disciplines. Cybernetics, chemistry, biology, above all psychology—men grudged the time for sleep, there was so much to do. Corinth scowled briefly as

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

he thought of certain experiments going on in the psych department: using a simplified improved electric-shock treatment for the selective destruction of cortical brain tissue in animals. It was revealing something about the function of cerebral areas, but not enough, he felt, to justify the cruelty of it. After all, the poor brutes were more aware of what was happening to them now than they had been before. He had voiced his indignation, here as well as at home, and thought his pressure would soon get the work discontinued. He hoped so; there was enough grief in the world without creating more.

The department heads were gathered around a long table in the main conference room. Rossman sat at its end, tall and thin and white-haired, no movement in his austere features. Dagmar Arnulfsen was at his right and Felix Mandelbaum at his left. For an instant Corinth wondered what the labor organizer was doing here, then realized that he must be representing the temporary, virtually autonomous city government.

"Good day, gentlemen." Rossman went through the forms of Victorian courtesy with a punctilio that might have been laughable if it hadn't stood for so desperate an effort to cling to something real and known. "Please be seated."

"Thank you, thank you." They found chairs.

"I got back from Washington last night," said Rossman. "Had to hire a plane; airline and railroad service is shot. I have called you together because I feel that an exchange of ideas and information is urgently needed. You will feel better for knowing what I can give you of the overall picture, and I will certainly be happier for what scientific explanation you have found. Together we may be able to plan intelligently."

"As for the explanation," said Lewis, "we've pretty well agreed here at the Institute that Dr. Corinth's theory is the correct one. This postulates that there is a region in space containing a forcefield of partly electromagnetic character. The field is believed to be generated by gyromagnetic action near the center of the galaxy, and to radiate outward in a cone which, by the time it has reached that part of space where the sun has its orbit, is many light-years in diameter. Its effect is to inhibit certain electromagnetic and electrochemical processes, among which the functioning of certain types of neurones is prominent. The basic theory of the phenomenon is now being worked out, using Rhayader's recent work in general relativity, and it's felt that we'll have a pretty good quantitative explanation before long."

"And then—?" Rossman lifted his brows.

"Who knows? At any rate, we

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

suppose that the Solar System, in its orbit around the center of the galaxy, entered this force-field a long time ago. Many millions of years ago, at the very least—hardly later than the Cretaceous. Possibly it had something to do with the extinction of the dinosaurs. We don't know yet, though we hope to find out."

Lewis paused to light a cigar, and Corinth took up the story. "Naturally this set life quite a ways back in its evolution. What nervous systems had been developed by that time were suddenly quite inadequate—slow, inefficient—and doubtless many of the higher species of that time died out. However, life as a whole did survive. And natural selection was still operative, there was still the upward trend in evolution. So—life adapted. The basic biochemistry and biophysics changed a little, over millions of years. Nervous systems compensated for the inhibiting force by becoming that much more efficient. In short, all life forms today are—or were, immediately before the change—about as intelligent as they would have been anyway."

"I see," nodded Rossman. "And then the sun and its planets moved out of the force-field."

"Yes. It's possible that there had been local variations in its intensity before, in space. If the field's strength slackened a bit now and then, it might account for such periods of extraordinary creativity as the neolithic revolution—agriculture, the ship, the wheel, and so on—the Greece of Pericles, and the Renaissance. That's just a guess, of course. We're sure, though, that Earth remained within the field until quite recently. Then the sun moved out of that region of space. The field must have a rather sharp boundary, for the change took place within a few days. It's stopped now; physical constants have remained constant for several days."

"But our minds haven't," said Mandelbaum bleakly.

"I know," cut in Lewis. "I'll come to that in a minute. The general effect of Earth's coming out of the inhibitor field was, of course, a sudden zooming of intelligence in every life-form possessing a brain. Suddenly the damping force to which every living organism was adjusted, was gone.

"Naturally, the lack of that environmental factor has produced an enormous unbalance. Nervous systems have tended to run wild, trying to stabilize and function on a new level. The physical layout of the brain is adapted to one speed—one set of speeds, rather—of neurone signals; now suddenly the speed is increased while the physical structure remains the same. In plain language, it'll take us awhile to get used to this."

"Why aren't we dead?" asked Grahovitch, the chemist. "I should think our hearts and so

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

on would start working like mad."

"The autonomic nervous system has been relatively little affected," said Lewis. "It seems to be a matter of cellular type; there are many different kinds of nerve cells, you know, and apparently only those in the cerebral cortex have reacted much to the change. Even there, the rate of functioning has not really gone up much—the factor is small—but apparently the processes of consciousness are so sensitive that it has made an enormous difference to what we call thought." He shrugged. "I realize that I'm actually doing little more than giving a name to an observed fact; but we just don't know enough yet to explain in detail. Your guess is as good as mine at this stage."

"But we will survive?"

"Oh, yes, I'm sure no physiological damage will result—to most people, anyway. Some have gone nuts, to be sure, but that's probably more for psychological than histological reasons."

"And—will we enter another such force-field?" queried Rossman.

"Hardly," said Corinth. "Our theory of the phenomenon is still inadequate, but I'm pretty sure there can only be one such, at most, in any galaxy. With the sun requiring some two hundred million years for its orbit around galactic center—well, we should have more than half that period before we have to start worrying about getting stupid again."

"M-hm. I see, gentlemen. Thank you very much." Rossman leaned forward, clasping his thin fingers before him. "Now as to what I have been able to find out, I fear it is not much, and that little is bad news. Washington is a madhouse, more so than it has ever been before. Key men have suddenly been walking off their posts, deciding that there are more important things in life than administering Public Law Number Such-and-such—"

"Well, I'm afraid they're right," grinned Lewis sardonically.

"No doubt. But let us face it, gentlemen, however little we may like the present system we cannot scrap it overnight."

"There should be enough men left to handle things," said Mandelbaum.

"Oh, there are, there are. I admit that the bureaucracy as a whole has reacted more sanely than I had imagined they would. However, the general breakdown of society has made them pretty impotent, cut off from the stream of events. The armed forces are torn by desertion and mutiny—the fact is being kept secret, of course, but it's true. Could any man suddenly become highly intelligent stomach the life of a noncommissioned soldier? Some can, but all too many cannot, and have used their new shrewdness to escape. The con-

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

sensus seems to be that patriotism is a shoddy and outworn symbol."

"All human societies," said Lewis, "are based on the assumption that only a small minority can or will think for itself. Suddenly the majority has started doing just that. Since we can't all be leaders, the whole system falls apart."

"I suppose there's a great fear of what Russia may do?" asked Weller, the mathematician.

"Naturally—a paralyzing terror. We would be helpless against armed aggression. However, nothing has happened yet, and perhaps nothing will. What military intelligence we have left indicates that the Soviet dictatorship is having troubles of its own. By sheer ruthlessness, they can doubtless keep better organized than we, but the effort takes all their energies." Rossman smiled thinly. "I understand a group here is organizing a clever scheme for dropping weapons on the Soviet Union from the air, especially in the Ukraine, in the hope of starting a revolution."

He sighed. "First things first, gentlemen. We have to worry about our own breakdown and the problem of keeping going somehow until a new order can be worked out. With all the social and economic chaos, Washington is helpless; all they can do is send out representatives whose advice may assist in reorganizing on a local basis."

"That's what I and some others have been doing here in New York," said Mandelbaum. He looked tired, burned out by days and nights of unresting effort. "I've been using the unions as a nucleus, talking to the boys, bullying them, pointing out how they have to stay alive, and keep society alive, if they hope to get their thousand and one bright new schemes carried out. We're getting things going. Essential services will be run. There'll be a volunteer militia to keep some kind of order. Arrangements will be made to buy and distribute food. I've worked out a pretty complete scheme, and the mayor's okayed it." One corner of his mouth lifted in a weary grin. "It's socialism of sorts. Only somehow that don't seem important any more."

"No," said Rossman very softly. "It doesn't matter now."

"Nevertheless, things are going to hell," said Mandelbaum. "There'll be rioting here in the city, I predict, which'll make the Harlem business look like a cocktail party. (No, I don't mean a tea party. Most cocktail parties are duller than any tea could ever be.) The general insanity and instability will bring it on, and a lot of people who'd sit tight while things ran smoothly will get caught up in it. As for what's going to happen to the rest of the world, I

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

don't know and I haven't got time to care."

He turned to Rossman. "You are an able organizer. Your other interests are going down the drain, and here's a job which has to be done. Will you help us?"

"Of course," nodded the old man. "And the Institute—"

"Will have to keep going. We got to understand just what's happened and what we can expect in the future. We've got to have a thousand things developed immediately if not sooner."

The talk turned to organizational details. Corinth had little to say. He was too worried about Sheila.

VII

"Now if you accept the law of similarity, that like causes like, as having the logical form of material implication," said Wato the witch doctor, "it becomes even more evident that this form of magic obeys the rule of universal causality. On the other hand, the law of contagion, which we have hitherto accepted, cannot be fitted into any such scheme and—"

"—is therefore of dubious validity, eh?" asked his colleague from the village downstream. "Possibly. However, if we are to work out the theory of beliefs handed down from our forefathers, we must adapt the logic to the facts and not the facts to the logic, especially when this formal logic is so recent a development of ours. It should be possible to work out a symbolic representation of causality which will embody all the known principles of magic as special cases. Now let me see—" He began tracing figures in the dust.

The two old men sat outside Wato's thatch hut, oblivious to the tall warriors who passed to and fro, not hearing the clank of weapons and the thick voices of the drums. M'Wanzi threw them an amused look as he strode by. Let them elaborate their dusty dreams as much as they wished. The rifle on his shoulder was solid reality and enough for him.

Enough for the Overlord of Africa!

Not yet, he reminded himself sternly, not yet. This strange clarity which had seized every mind was still too new a thing to be trusted. It might fail them just when they needed it most terribly. But then—his fist clenched—they would die like men, at least, having struck a blow for an ancient wish.

Free the black man! Drive the white oppressors beyond the sea! Since his youth and the days of horror on the plantation, it had been his life. But only now—

Well, he had not been frightened by that which was happening within his soul, as the others were. He had seized this power to think with a swift

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

fierce gladness, and his will had dominated whole tribes driven half crazy with fear, ready to turn anywhere for the comfort of leadership. Over thousands of miles, from Congo jungle to the veldts of the south, men tormented and enslaved and spat upon had lifted weary faces to a message blown down the wind. *Now* was the time to strike, before the white man also rallied —the scheme was ready, lying in the soul of M'Wanzi the Elephant, the campaign was planned in a few flashing days, the army was stirring to life, now was the time to be free!

The drums talked around him as he went toward the edge of the jungle. Soon, now, soon they would call the gathering men to battle, and war would burn from the northern desert to the southern ocean, and in the end the men of Africa would be free. The men and the—

M'Wanzi stepped through a wall of canebrake into the thick hot shadows of the forest. Another shadow moved down, flitted across the earth and waited grotesquely before him. Wise brown eyes regarded him with an ancient sadness.

"Have you gathered the brethren of the forest?" asked M'Wanzi.

"They come soon," said the ape.

That had been M'Wanzi's great realization. All the rest, the organization, the planned campaign, that was nothing beside this: that if the souls of men had suddenly grown immensely bigger, so must the souls of animals have done. His guess had been confirmed by terrified stories of raids on farms made by elephants of demoniac cunning, but when those reports came he was already working out a common language of clicks and grunts and murmurs with a captured chimpanzee. The apes had never been much less intelligent than man, M'Wanzi suspected—secure and happy in their tree-top life, they had simply had nothing to gain by toiling in the fields and herding cattle and pay tribute to white tax collectors. But he, M'Wanzi, could offer them much in exchange for their help; and were they not Africans too?

"My brother of the forest, go tell your people to make ready."

"Not all of them wish this thing, brother of the fields. They must be beaten before they wish it. That takes time."

"Time we have little of. Use the drums as I taught you. Send word throughout the land and let the hosts gather at the appointed places."

"It shall be as you wish. When next the moon rises full, the children of the forest shall be there, and they shall be armed with knives and blowguns and assegais as you showed me."

"Brother of the forest, you have gladdened my heart. Go with fortune and carry that word."

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

The ape turned and swung lithely up a tree. A stray sunbeam gleamed off the rifle slung at his back.

Corinth sighed, yawned, and got up from his desk, shoving the papers away. He did not say anything aloud, but to his assistants, hunched over some testing apparatus, the meaning was clear: "To hell with it. I'm too tired to think straight any more. Going home."

Johansson gestured with his hand, conveying as well as if he had spoken: "Think I'll stay here for awhile, chief. This gimmick is shaping up nice." Grunewald looked up and added a curt nod.

Corinth fumbled automatically after a cigarette, but his pocket was empty. Smokes just weren't to be had these days. He hoped the world would get back on an operating basis soon. God! What was happening outside the city? A few radio stations, professional and amateur, were maintaining a tenuous web of communications across western Europe, the Americas, and the Pacific, but the rest of the planet seemed to be swallowed by darkness—an occasional report of violence, like lightning in the night, and then nothing. Such news as he got was all bad, rioting, insurrection, hunger, crime, a civilization falling apart.

Mandelbaum had warned him yesterday to be on his guard. Missionaries of the Third Ba'al had entered town despite all precautions and were making converts right and left. The new religion seemed to be wholly orgiastic, with a murderous hatred for logic and science and rationality of all kinds—you could expect trouble.

Corinth went down hallways that were tunnels of dusk. They had to conserve electricity; only a few power stations were still going, manned and guarded by volunteers. Rather than summon the elevator, he walked down seven flights to ground level. Loneliness oppressed him, and when he saw a light in Dagmar's office he paused, startled, and then knocked.

"Come in."

He opened the door. She sat behind a littered desk, writing up some kind of manifest. The symbols she used were strange to him, probably her own invention and more efficient than the conventional ones. She still looked as severely handsome as she had always done, but there was a deep weariness that paled her eyes.

"Hullo, Pete," she said. The smile that twitched her mouth was tired, but it had warmth. "How've you been?"

"Oh—all right. But you—I thought you'd been co-opted by Felix to help whip his new government into shape." Actually, Corinth had spoken two words and made three gestures; she could fill in his intention from

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

logic and her knowledge of his old speech habits.

"I have. But I feel more at home here, and it's just as good a place to do some of the work. Who've you got on my old job, by the way?"

"Billy Saunders—ten years of age, but a sharp kid. Maybe we should get a moron, though. The physical strain may be too much for a child."

"I doubt it. There isn't much to do now, really. You boys cooperate pretty smoothly since the change—unlike the rest of the world!"

"I don't know if it's safe for you to come so far from where you live." Corinth shifted awkwardly on his feet. "Look, let me take you home."

"Not necessary." She spoke with a certain bite in her tones, and Corinth realized dully that she loved him.

And all our feelings have intensified. I never knew before how much of man's emotional life is bound up with his brain, how much more keenly he feels than any other animal. For to him there is more than simple pain and yearning, to him there is a meaning in all the world; everything that touches him means more than itself, it is a symbol of—what?

"Sit down," she invited, leaning back in her seat. "Rest for a minute."

He smiled wearily, lowering himself into a chair. "Wish we had some beer," he murmured. "It would be like the old days."

"The old days—the lost innocence. We'll always regret them, won't we? We'll always look back on our blindness with a wistful longing that the new generation simply won't understand. Oh, damn it all, anyway!" She beat a clenched fist against the desk top, very softly. The light gleamed gold in her hair.

"How's your work coming along?" she asked after a moment. The silence hummed around them.

"Good enough. I've been in touch with Rhayader in England, over the short wave. They are having a tough time, but keeping alive. Some of their biochemists have been working on yeasts, getting good results. By the end of the year they hope to be able to feed themselves adequately, if not very palatably as yet—food synthesis plants being built. He gave me some information that just about clinched the theory of the inhibitor field—how it's created. I've got Johansson and Grunewald at work on an apparatus to generate a similar field on a small scale; if they succeed, we'll know that our hypothesis is probably right. Then Nat can use the apparatus to study biological effects in detail. As for me, I'm going into the development of Rhayader's general relativity-cum-quantum mechanics—applying a new variation of communications theory, of all things, to help me out."

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

"What's your purpose, other than curiosity?"

"Quite practical, I assure you. We may find a way to generate atomic energy from any material whatsoever, by direct nucleonic disintegration: no more fuel problems. We may even find a way to travel faster than light. The stars—well—"

"New worlds. Or we might return to the inhibitor field, out in space—why not? Go back to being stupid. Maybe we'll be happier that way . . . No, no, I realize you can't go home again." Dagmar opened a drawer and took out a crumpled packet. "Smoke?"

"Angel! How on Earth did you manage that?"

"I have my ways." She struck a match for him and lit her own cigarette with it.

They smoked in silence for awhile, but the knowledge and the reading of each other was like a pale flickering between them.

"You'd better let me see you home," said Corinth. "It's not safe out there. The prophet's mobs—"

"All right," she said. "Though I've got a car and you haven't."

"It's only a few blocks from your place to mine, in a safe district."

Since it was not possible as yet to patrol the entire sprawling city, the government had concentrated on certain key streets and areas; an organization not unlike the medieval Burgher Guard kept order there, and gradually spread its influence outward.

Corinth took off his glasses and rubbed his eyes. "I don't really understand it," he said. "Human relationships were never my long suit, and even now I can't quite— Well, why should this upsurge of intelligence throw so many back to the animal stage? Why can't they see—"

"They don't want to." Dagmar drew hard on her cigarette. "Quite apart from those who've gone insane, and they're an important factor, there remains the necessity of not only having something to think with, but something to think about. You've taken millions—hundreds of millions—of people who've never had an original thought in their lives and suddenly thrown their brains into high gear. They start thinking—but what basis have they got? They still retain the old superstitions, prejudices, hates and fears and greeds, and most of their new mental energy goes to elaborate rationalization of these. Or they grab onto the first thing that comes along, in a frantic search for intellectual and emotional security; clutch it tight, make it a bulwark against an unknown become all the more horrible because they can suddenly visualize just how big it is. Remember, most cranks and fanatics—a lot of them, at least—before the change were of

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

above-the-average intelligence."

"Ummm—yes— After all, what is intelligence? The ability to create and handle abstractions. That's been increased, yes, but nothing has been said about the kind of abstractions. Nor have most of these people had any training in thought. They don't know *how*, and they can't be expected to invent formal logic and semantics for themselves overnight."

"Sure." There was a faint scorn in Dagmar's tone. "If you stop to consider it, you'll realize that nobody ever did much thinking for himself. I mean nobody. Even the scientists and philosophers and the others who thought for a living, well, they just confined their originality to some limited area and accepted the ready-made conclusions of their social group in every other field, without critical analysis. You did. I did. We all did."

"I'm afraid," said Corinth wryly, "that intelligence has always been secondary, and still is. Sure, it's an integral part of man, but not the dominant part. His fears and needs and passions have always been the driving force."

"Uh-huh." Dagmar winced. When she looked up again, her voice was flat and impersonal. "Also, don't forget that a lot of smart and ruthless characters have taken advantage of the situation. Sheer personality can still dominate sheer intellect. There's been one hell of a big crime wave, as you know, crooks using their new brains to pull off bigger and more ingenious schemes. And someone like this Third Ba'al, well, he offers an anodyne to frightened and confused people; he tells them it's all right to throw off this terrible burden of thought and forget themselves in an emotional orgy. It won't last, Pete, but the transition is tough."

"Yeah—hm—I had to get an I.Q. of 500 or so—whatever that means—to appreciate how little brains count for, after all. Nice thought." Corinth grimaced and stubbed out his cigarette.

Dagmar shuffled her papers together and put them in a drawer. "Shall we go?"

"Might as well. It's close to midnight. Sheila'll be worried, I'm afraid."

They walked out through the deserted lobby to the street. A solitary lamp cast a dull yellow puddle of luminance on Dagmar's car. She took the wheel and they purred quietly down an avenue of night.

"I wish—" Her voice out of darkness was thin. "I wish I were out of this. Off in the mountains somewhere."

He nodded, suddenly sick with his own need for open sky and the clean light of stars.

The mob was on them so fast that they had no time to escape. One moment they were driving down an empty way between blind walls, the next instant the ground seemed to vomit men.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

They came pouring from the side streets, quiet save for a murmur of voices and the shuffling of a thousand feet, and the few lamps gleamed off their eyes and teeth.

"Son-of-a—!" Dagmar braked to a squealing halt as the surge went in front of them, cutting them off.

"Kill the scientists!" It hung like a riven cloud for a moment, one quavering scream which became a deep chanting. The living stream flowed around the car, veiled in shadow, and Corinth heard their breathing hot and hoarse in his ears.

Break their bones and burn their homes,
Take their wimmin, the sons of sin,
Wallow hollow an' open the door,
Open an' let the Third Ba'al in!

A sheet of fire ran up behind the tall buildings, something was in flames. The light was like blood on the dripping head which someone lifted on a pole.

They must have broken the line of the patrols, thought Corinth wildly, they must have smashed into this guarded region and meant to lay it waste before reinforcements came.

A face dirty and bearded and stinking shoved in through the driver's window. Uh woman! He got uh woman here!"

Corinth took the pistol from his coat pocket and fired. Briefly, he was aware of its kick and bark, the stinging of powder grains in his skin. The face hung there for an eternal time, dissolved into blood and smashed bone. Slowly it sagged, and the crowd screamed. The car rocked under their thrusts.

Corinth braced himself, shoving at his own door, jamming it open against the milling press of bodies. Someone clawed at his feet as he scrambled up on the hood. He kicked, feeling his shoe jar against teeth, and stood up. The firelight blazed in his face. He had taken off his glasses, without stopping to think why it was unsafe to be seen wearing them, and the fire and the crowd and the buildings were a shifting blur, fog and shadow and the flames of a primitive hell.

"Now hear me!" he shouted. "Hear me, people of Ba'al!"

A bullet whanged past him, he felt its hornet buzz, but there was no time to be afraid. "Hear the word of the Third Ba'al!"

"Let 'im talk!" It was a bawling somewhere out in that flowing, mumbling, unhuman river of shadows. "Hear his word."

"Lightning and thunder and rain of bombs!" yelled Corinth. "Eat, drink, and be merry, for the end of the world is at hand! Can't you hear the planet cracking under your feet? The scientists have fired the big atomic bomb. We're on our way to kill them before the world breaks open like rotten fruit. Are you with us?"

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

They halted, muttering, shuffling their feet, uncertain of what they had found. Corinth went on, raving hardly aware of what he was saying. Anything to divert them! "—kill and loot and steal the women! Break open the bottle shops! Fire, clean fire, let it burn the scientists who fired the big atomic bomb. This way, brothers! I know where they're hiding. Follow me!"

"Kill them!" The head on the pole bobbed insanely, and firelight wavered off its teeth. "Hooray, hooray, kill 'em!" The cheering grew, huge and obscene between the cliff-walls of Manhattan.

"Down there!" Corinth danced on the hood, gesturing toward Brooklyn. "They're hiding there, people of Ba'al. I saw the big atomic bomb myself, with my own eyes I saw it, and I knew the end of the world was at hand. The Third Ba'al himself sent me to guide you. May his lightnings strike me dead if that ain't the truth!"

Dagmar blew her horn, an enormous echoing clamor that seemed to drive them into frenzy. Someone began capering, goat-like, and the others joined him, and the mob snake-danced down the street.

Corinth climbed to the ground, shaking uncontrollably. "Follow 'em," he gasped. "They will get suspicious if we don't follow 'em."

"Sure thing, Pete." Dagmar helped him inside and trailed the throng. Her headlights glared off their backs. Now and then she blew the horn to urge them on.

There was a whirring high in heaven. Corinth's breath whistled between his teeth. "Let's go," he mumbled.

Dagmar nodded, made a U-turn, and shot back down the avenue. Behind them, the mob scattered as helicopters sprayed them with tear gas.

After a silent while, Dagmar halted before Corinth's place. "Here we are," she said.

"But I was going to see you home," he said feebly.

"You did. Also you stopped those creatures from doing a lot of harm, to the district as well as us." The vague light glimmered off her smile; it was shaky and tears lay in her eyes. "That was wonderful, Pete. I didn't know you could do it."

"Neither did I," he said huskily.

"Maybe you missed your calling. More money in revivals, I'm told. Well—" She sat for a moment. "Well, good night."

She leaned forward, lips parted as if she were about to say something more. Then she clamped them shut, shook her head. The slamming of the door was loud and empty as she drove off.

Corinth stood looking after the car till it was out of sight. Then he turned slowly and entered his building.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

VIII

Supplies were running low—food for himself, feed and salt for the animals left to him. There was no electricity, and he didn't like to use fuel in the gasoline lamp he had found. Brock decided that he would have to go to town.

"Stay here, Joe," he said. "I ought to be back soon."

The dog nodded, an uncannily human gesture. He was picking up English fast; Brock had a habit of talking to him and had lately begun a deliberate program of education. "Keep an eye on things, Joe," he said, looking uneasily to the edge of the woods.

He filled the tank of a battered green pickup from the estate's big drums, got in, and went down the driveway. It was a cool, hazy morning, the smell of rain was in the air and the horizon lay blurred. As he rattled down the county road, he thought that the countryside was utterly deserted. There was no one in the ripening grainfields, no one in yards littered by wind or pastures empty of cattle. Anything could have happened in the—what was it? two months?—since the change. Maybe there wouldn't be anyone in town at all. He'd just have to find out.

Turning off on the paved state highway, he pushed the accelerator till the motor roared. He wasn't eager to visit normal humanity, and wanted to get it over with. His time alone had been peaceful—plenty of hard work, yes, to keep him busy; and when he wasn't too occupied or tired he was reading and thinking, exploring the possibilities of a mind which by now, he supposed, was that of a high-order genius by pre-change standards. He had settled down phlegmatically to an anchorite's life—there were worse fates—and didn't relish meeting the world again.

But damn it, he had to live. The estate's groceries were about gone, and he was running out of all kinds of supplies. It was time to get in the hay, which one man could hardly do, and after that there would be the grain to combine and the corn to pick and—*well, let's face it,* he thought—some butchering to do. He hadn't killed any of the stock yet, the sheep and cows still with him; having no past knowledge of their fate, they were trustful, had even respected his fences for the most part. He wondered how much they really were thinking. They didn't act very differently, but then they had no reason to do so. Many humans in the old days, whole societies of them, had lived quiet eventless existences for hundreds of years at a time, and Brock doubted that his stock was quite up to the average pre-change human mentality. Even if it was, well, their minds would not be the same kind as

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

man's: their basic instincts would be different. Alone the lack of hands, of the tool-making capability, would make for a tremendous otherness.

He had gone over to Martinson's, the neighbor's, a few days ago, but no one had been there, the place was boarded up and empty. It had given him such an eerie feeling that he hadn't tried anyone else.

A few outlying houses slid past, and then he was over the viaduct and into the town. There was no one in sight, but the houses looked occupied. The shops, though—most of them were closed, blind windows looked at him and he shivered.

He parked outside the A & P supermarket. A couple of automobiles stood before it, and he saw a man inside. He swallowed a dryness in his throat and got out and walked to the door. It opened for him—they must have put in a photoelectric unit.

It didn't look much like a store. The goods were there, but the man behind the counter—its cash register was gone, he noticed—did not have the air of a clerk. He was just sitting there, sitting and—thinking?

Brock went over to him, his feet curiously loud on the floor. "Uh—excuse me," he began, very softly.

The man looked up. Recognition flickered in his eyes and a brief smile crossed his face. It was a strangely detached and amused smile. "Oh, hello, Archie," he said, speaking with elaborate slowness. "How are you?"

"All right, th-thanks." Brock looked down at his shoes, unable to meet the quiet eyes. "I, well, I came to buy some stuff."

"Oh?" There was a coolness in the tone which set his heart thumping. "I'm sorry, but we aren't running things on a money basis any more."

"Well, I—" Brock squared his shoulders and forced himself to look up. "Yeah, I can see that, I guess. The national government's broken down, ain't—hasn't it?"

"Not exactly. It has just stopped to matter, that is all." The man shook his head. "We had our troubles here at the beginning, but we reorganized on a rational basis. Now things are going pretty smoothly. We still lack items we could get from outside, but we can keep going indefinitely as we are."

"A—socialist economy?"

"Well, Archie," said the man, "that's hardly the right label for it, since socialism was still founded on the idea of property. But what does ownership of a thing actually mean? It means only that you can do just what you choose with the thing. By that definition, there was very little complete ownership anywhere in the world. It was more a question of symbolism. A man said to himself, 'This is *my* home, *my* land,' and got a feel-

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

ing of strength and security; because the 'my' was a symbol for that state of being, and he reacted to the symbol. Now—well—we have seen through that bit of self-deception. It served its purpose before, it made for self-respect and emotional balance, but we don't need it anymore. There's no longer any reason for binding oneself to a particular bit of soil when the economic function it served can be carried out more efficiently in other ways. So most of the farmers hereabouts have moved into town, taking over houses which were deserted by those who chose to move away from the neighborhood altogether."

"And you work the land in common?"

"Hardly the correct way to phrase it. Some of the mechanically minded have been devising machines to do most of this for us. It's amazing what can be done with a tractor engine and some junkyard scrap if you have the brains to put it together in the right way. We've found our level, for the time being at least. Those who didn't like it have gone, for the most part, and the rest are busy evolving new social forms to match our new personalities. It's a pretty well-balanced set-up here."

"But what do you *do?*"

"I'm afraid," said the man gently, "that I couldn't explain it to you."

Brock looked away again. "Well," he said finally, his voice oddly husky, "I'm all alone on the Rossman place and running short on supplies. Also, I'm gonna need help with the harvest and so on. How about it?"

"If you wish to enter our society, I'm sure a place can be found."

"Place, hell!" There was a sudden anger in him, bleak and bitter. "All I want is a little help. You can take a share of the crop to pay for it. Wouldn't be any trouble to you if you have these fancy new machines."

"You can ask the others," said the man. "I'm not really in charge. But I'm afraid it would be all or nothing for you, Archie. We won't bother you if you don't want us to, but you can't expect us to give you charity either. That's another outmoded symbol. If you want to fit yourself into the total economy—it's not tyrannical by any means, it's freer than any other the world has ever seen—we'll make a place for you."

"Charity—an outmoded symbol." Brock looked at him for a long moment. "So you swapped your hearts for brains."

"No, Archie. But our compassion is of a different sort now. As a matter of fact, it would be too cruel to you if we did as you suggest. You would still be an outsider, but our presence would be there to gall you. I don't think you could stand it for very long."

"In short," said Brock thickly, "I can be a domestic animal and

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

do what chores I'm given, or a wild one and ignored. For *my* sake—huh!" He turned on his heel. "Take it and stick it."

He was trembling as he walked out and got back into the truck. The worst of it, he thought savagely, the worst of it was that they were right. He couldn't long endure a half-in-half-out pariah status. It had been all right once, being feebleminded; he didn't know enough then to realize that he was. Now he did, and the dependent life would break him.

The gears screamed as he got started. To hell with them! He'd make out, damn if he wouldn't. If he couldn't be a half-tamed beggar, and wouldn't be a house-pet, all right, he'd be a wild animal. To hell with them all!

He drove back at a reckless speed. On the way, he noticed a machine out in a hayfield—a big enigmatic thing of flashing arms, doing the whole job with a single bored-looking man to guide it. They'd probably build a robot pilot as soon as they could get the materials. So what? He still had two hands.

His calm temperament reasserted itself as he neared the estate, and he settled down to figuring. There were ten cows—the rest he had taken over to Martinson's early in the game—and from them he could get milk and butter, maybe cheese. A few slaughtered sheep—no, wait, why not hunt down some of those damned pigs instead?—would give him meat for quite awhile; there was a smokehouse on the place. He could harvest enough hay, grain, and corn—Tom and Jerry would just have to work!—to keep going through the winter; if he improvised a quern, he could grind a coarse flour and bake his own bread. There were plenty of clothes, shoes, tools. Salt for the animals was his major problem, and he'd have to save on gasoline and cut a lot of wood for winter, but he thought he could pull through.

The magnitude of the task appalled him. One man! One pair of hands! But what the hell, it had been done before, the whole human race had come up the hard way. If he took a cut in his standard of living and ate an unbalanced diet for awhile, it wouldn't kill him.

And he had a brain which by pre-change standards was something extraordinary. Already, in what little spare time there was, he had used Rossman's extensive library to approach a normal education. He could put that mind to work: first, devising a schedule of operations for the next year or so, and secondarily inventing gadgets to make survival easier. Sure—he could do it.

He squared his shoulders and pushed down the accelerator, anxious to get home and begin.

The noise as he entered the driveway was shattering. He heard the grunts and squeals

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

and breaking of wood, and the truck lurched with his panicky jerk. Ye gods—the pigs! The pigs had been watching and had seen him go and—

And he had forgotten his gun.

He cursed and came roaring up the drive, past the house and into the farmyard. There was havoc. The pigs were like small black and white tanks, chuffing and grunting. The barn door was burst open and they were in the stored feed bags, ripping them open, wallowing in the floury stuff, some of them dragging whole sacks out into the woods. There was a bull too; he must have run wild. He snorted and bellowed as he saw the man and the cows were bawling around; they had broken down their pasture fence and gone to him. Two dead sheep, trampled and ripped, lay in the yard; the rest must have fled in terror. And Joe—

"Joe," groaned Brock. "Where are yuh, boy?"

It was raining a little, a fine misty downpour which blurred the woods and mingled with the blood on the earth. The old boar looked shiny as iron in the wetness. He lifted his head when the truck came and squealed.

Joe barked wildly from the top of a brooder house. He was bleeding; it had been a cruel fight, but he had somehow managed to scramble up there and save himself. There was a sobbing in Brock's throat.

He backed the truck, swinging it around and driving into the flock. They scattered before him; he couldn't get up enough speed in this narrow place to hit them and they weren't yielding. The bull charged.

That impact shook the truck. Brock saw the thin steel paneling buckle. The bull shoved, wrenching at the door, and it sagged on its hinges. Joe leaped from the top of the brooder house. The pigs mobbed him.

There wasn't time to be afraid, but Brock saw death. He swung the truck about, careening across the yard. Turning, he charged the bull, and the animal met him head-on. Brock felt a giant's hand throw him against the windshield.

Something loomed out of the woods and mist. It was gray, enormous, reaching for the sky. The bull lifted his dazed head and snorted. The pigs stopped their battering attack and for a moment there was silence.

A shotgun blast ripped like thunder. The old boar was suddenly galloping in circles, wild with pain. Another explosion sent the bull crazy, turning on his heels and making for the woods.

An elephant, gibbered Brock's mind, *an elephant come to help—*

The big gray shape moved slowly in on the pigs. They milled uneasily, their eyes full of hate and terror. The boar fell to the ground and lay gasping out his life. The elephant curled up its trunk and broke into an oddly

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

graceful run. And the pigs fled.

Brock was still for a long while, shaking too badly to move. When he finally climbed out, the wrench hanging loosely in one hand, the elephant had gone over to the haystack and was calmly stuffing its gullet. And two small hairy shapes squatted on the ground before the man.

Joe barked feebly and limped over to his master. "Quiet, boy," mumbled Brock. He stood on strengthless legs and looked into the wizened brown face of the chimpanzee who had the shotgun.

The chimpanzee regarded him for a long time. It was a male, and he remembered reading that the tropical apes couldn't stand a northern climate very well. These must have escaped from some zoo or circus, he thought, and stolen the gun and taken—or made a bargain with?—the elephant. Now—

The chimpanzee shuddered. Then, very slowly, always watching the man, he laid down the gun and went over and tugged at Brock's jacket.

"Do you understand me?" asked the man. He felt too tired to appreciate how fantastic a scene this was. "You know English?"

There was no answer, except that the ape kept pulling at his clothes, not hard, but with a kind of insistence. After awhile, one long-fingered hand pointed from the jacket to himself and his mate.

"Well," said Brock softly, "I think I get it. You two escaped near the beginning o' the change, eh? And since then you've been afraid of man, you don't know what we might do to you, and you've been hiding by day and traveling by night and living off what you could find or steal. And you realize now you can't keep going long by yourselves, you need human help, only you don't want to go back to sitting in a cage. Is that right?"

No answer. But something in the wild eyes pleaded with him.

"Well," said Brock, "you came along in time to do me a good turn, and you ain't killing me now when you could just as easy do it." He took a deep breath. "And God knows I could use some help on this place, you two and your elephant might make all the difference. And—and—okay. Sure."

He took off the jacket and gave it to the chimpanzee. The ape chattered softly and slipped it on. It didn't fit very well, but—"Oh, hell, I can tailor up some clothes for you. Sure, come along into the house and get something to eat."

They skipped after him, suddenly grinning and chuckling to themselves. Joe looked unhappy, and Brock paused to caress him. "Never mind, old boy, you're still top dog here." He straightened his bent shoulders. "All right. Fine. We'll all be wild animals together. Okay?"

(To be concluded)

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

(Continued from page 95)

THE GOLDEN APPLES OF THE SUN, by Ray Bradbury (Doubleday, $3.00) • I am going to put my big foot in my big mouth and start an argument by stating that Ray Bradbury does not write science fiction any more than George O. Smith writes grand opera. Here are 22 stories; quaint, fanciful, wistful, gruesome, pleasant, ugly, amusing, serious, graceful, awkward, brilliant, stupid, angry, happy, funny, sober, satirical, pathetic, sweep, prophetic, untimely, and a bit mad. All 22 are readable Bradbury. But let's stop claiming Ray Bradbury as a science-fiction writer and let's accept him as a younger, American-type John Collier, who does not write science fiction either. This egregious oversight seems not to have harmed Collier or Bradbury in the slightest.

ADVENTURES IN DIMENSION, an anthology edited by Groff Conklin. (Vanguard, $2.95) • As the title indicates, this is a collection of time-travel tales and parellel-world themes. Included are Sturgeon's very pleasant little mixup *Yesterday Was Monday* and Lewis Padgett's frustrating *Endowment Policy*. Also included is the screwball *Gostak And The Doshes* by Miles J. Breuer which I was glad to re-read after all these years of hard-boiled semantics, Korzybski, and Null A.

Groff may have missed a bet by not including a couple of the real time-twizzlers that make time-travel stories so much fun to read and write. This is an open suggestion for the next volume, Groff, and you can start off with *By His Bootstraps* and *As Never Was*.

FLYING SAUCERS, by Donald H. Menzel (Harvard University Press, $4.75 • This is the non-fiction book of the month as far as I am concerned. Dr. Menzel is professor of astrophysics at Harvard, and therefore his business provides him with an excellent background for writing this book. First, his years of studying the sky by night and day have given him a chance to see many upper-air phenomena that we mundane mortals seldom witness. Second, he is an observer trained to identify what he sees.

This book is a discussion of myth, truth, and history about the flying saucer business. There is no doubt that a lot of people have seen a lot of things in the sky, but Dr. Menzel is firm in his statements that most people do not properly identify what they see. He discusses some of the more sensational sightings and attempts to analyze them, using the meager data provided by the observer. These he occasionally compares against historic sightings of sky-borne objects, standard mirage effects, and some of the "Spectres" that visit certain shrines and

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

other famous places. Dr. Menzel's discussion of the formation of rainbows, haloes, and that seldom-seen celestial animal, the "Sundog," is far more satisfying than previous sensationalistic ramblings about green men from Venus, visitors from Wolf 359, or Rooshian secret weapons (presumably so secret that the Kremlin dares not show them to their own people).

Then with the ease of a mammoth crushing gnats, Dr. Menzel dismisses the pseudo-scientific bafflegab of the flying saucer enthusiasts, destroys the aura of mysticism, and pours a lot of cold water on the so-called "Security Wrap" notion. He further demonstrates the weaknesses in the incomplete arguments in favor of sentient life in strange mechanisms sent to spy upon us.

This book was written for us non-believers who—up to now—have had no savant to quote in answer to verbal scientists like Frank Scully and Donald Keyhoe.

Go get it!

THE SANGER-BREDT REPORT, A Rocket Drive For Long Range Bombers. (Copies are available from Dr. Robert Carnog; 990 Cheltenham Road, Santa Barbara, Cal. $3.95 Postpaid.) • When this book arrived, I read it with growing interest, and also with a feeling that I'd heard tell of something like this before. Then I got to Page 51 and saw the diagram of the proposed rocket bomber. Reaching for Willy Ley's *Rockets, Missiles, and Space Travel*, I found the answer on Page 370.

This is the complete Sanger-Bredt Report, with the details of design and the preliminary experiments made on the proposed intercontinental bomber. The report is profuse with sketches, graphs, and a spattering of mathematics (the latter can be skipped over unless you care to build a rocket-driven bomber in your attic!). There are a lot of photographs of test-stands and experimental set-ups, all of which are described in the text. Included is a discussion of saturation-bombing of a city, both from the dropped bomb and the bomb released with a high horizontal velocity. At the end of the report is a series of maps showing the range of the rocket bomber calculated for a large number of variations of payload and conditions of take-off and landing.

It will tell you a lot of things you did not know before about rocket-powered devices.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

the boy who grew up in a house full of manless women

The Strange Relationship

between Nietzsche and his sister Elisabeth

SUPPRESSED FOR FIFTY YEARS

revealed at last in the philosopher's own confession

MY SISTER AND I

The story of a Famous Brother and a terrifyingly ambitious younger Sister, who grew to love each other physically as children and continued to do so into maturity—to the exclusion of all other men and women.

One has to read only a few pages of this breathless book to realize why it has been hushed up all these years.

Quite simply, and in fearful earnest, the 19th century's greatest philosopher tells how he was gradually led into this extraordinarily dangerous love-trap which kept him from marrying and caused the suicide of his sister's only husband.

MY SISTER AND I was written in an asylum in Jena. Undoubtedly it was his studied revenge on his family for refusing to let him publish an earlier and much tamer confession, entitled *Ecce Homo* which did not appear till ten years after his death.

MY SISTER AND I had to wait over fifty years because it could not be made public until all the actors in the great drama had passed away.

PUBLISHED AT $4
Special Price to Our Readers
ONLY $2.95
Order Before Stock Is Exhausted

CONTINENTAL BOOKS:
110 Lafayette St.,
New York 13, N. Y. SP-1

Gentlemen: I enclose $2.95 for my copy of the $4 edition of *MY SISTER AND I*. I may return it for *full credit* if it does not *fully meet my expectations*.

NAME_____

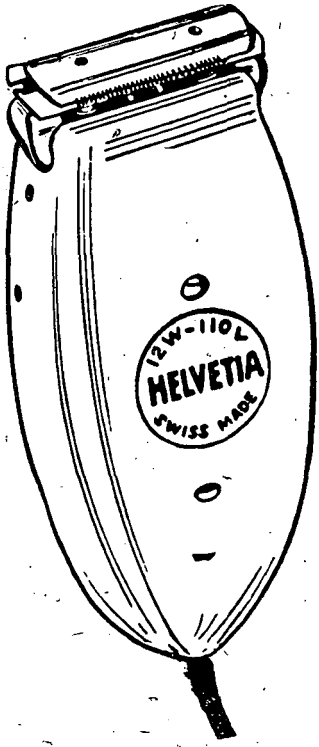
ADDRESS_____

CITY_____

ZONE_____ STATE_____

☐ Send C.O.D.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED



AMAZING!

the QUIET

HELVETIA

A NEW SWISS ELECTRIC SHAVER AT A LOW, LOW PRICE

Shaving becomes fun instead of work with the sturdy, clean-shaving "Helevetia" Electric Shaver.
Made by Swiss craftsmen with traditional Swiss precision built in for long life.
Sensationally quiet—you can listen to the radio while shaving . . .
It has "direct cut" self sharpening blade made to last . . .
Ideal for LADIES' personal use, too. Cuts clean and smooth with no muss or fuss.

Each Helvetia shaver is GUARANTEED FOR ONE YEAR. Written GUARANTEE certificate. Importer maintains stockpile of service parts.
Never before an **imported, precision** electric shaver at such a low price. Order yours **now** while the supply lasts! Send in the coupon below.

MAIL SALES, 80 Fifth Avenue, N. Y., N. Y.
Dept. No. D4
Gentlemen:

Rush me my HELEVETIA electric shaver. I'll pay postman only $6.95 plus postage.

NAME .....

ADDRESS .....

CITY ..... STATE .....

SAVE POSTAGE! ENCLOSE $6.95 with order and we pay postage.

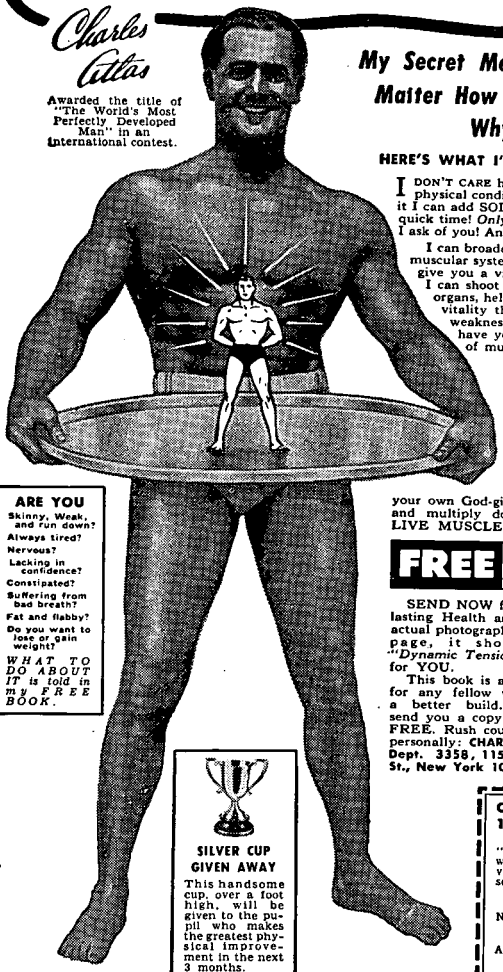
LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

Tired of Being Ashamed of Your Build?

LET ME GIVE YOU A NEW HE-MAN BODY!

Charles Atlas

Awarded the title of "The World's Most Perfectly Developed Man" in an international contest.



My Secret Method Has Worked for Thousands No Matter How Skinny or Flabby They Were — Now, Why Not Let It Work For You?

HERE'S WHAT I'LL PROVE 15 MINUTES A DAY CAN DO FOR YOU

I DON'T CARE how old or young you are, or how ashamed of your present physical condition you may be. If you can simply raise your arm and flex it I can add SOLID MUSCLE to your biceps—yes, on each arm—in double-quick time! *Only 15 minutes a day*—right in your own home—is all the time I ask of you! And there's no cost if I fail.

I can broaden your shoulders, strengthen your back, develop your whole muscular system INSIDE and OUTSIDE! I can add inches to your chest, give you a vise-like grip, make those legs of yours lithe and powerful. I can shoot new strength into your old backbone, exercise those inner organs, help you cram your body so full of pep, vigor and red-blooded vitality that you won't feel there's even "standing room" left for weakness and that lazy feeling! Before I get through with you I'll have your whole frame "measured" to a nice, new beautiful suit of muscles!

WHAT'S MY SECRET?

"DYNAMIC TENSION!" That's the ticket! The identical natural method that I myself developed to change my body from the scrawny skinny chested weakling I was at 17 to my present superman physique! Thousands of other fellows are becoming marvelous physical specimens—my way. I give you no gadgets or contraptions to fool with. When you have learned to develop your strength through *"Dynamic Tension"* you can laugh at artificial muscle-makers. You simply utilize the DORMANT muscle-power in your own God-given body—watch it increase and multiply double-quick into real solid LIVE MUSCLE.

ARE YOU

Skinny, Weak, and run down?
Always tired?
Nervous?
Lacking in confidence?
Constipated?
Suffering from bad breath?
Fat and flabby?
Do you want to lose or gain weight?

WHAT TO DO ABOUT IT is told in my FREE BOOK.

FREE Illustrated 32-page Book. Just Mail the Coupon.

SEND NOW for my famous book, "Everlasting Health and Strength." Packed with actual photographs. Page by page, it shows what *"Dynamic Tension"* can do for YOU.

This book is a real prize for any fellow who wants a better build. Yet I'll send you a copy absolutely FREE. Rush coupon to me personally: **CHARLES ATLAS, Dept. 3358, 115 East 23rd St., New York 10, N. Y.**

"I gained 11 lbs. and 4¼ inches on my chest, 3 inches on my arms. I am never constipated."
—Henry Nevens, Canada

"I gained 34 lbs. and increased my chest 6 inches!"
—Stanley Lynn, Calif.

"What a difference! Have put 3½ inches on my chest (normal) and 2½ inches expanded."
—F. S., New York

"Gained 29 pounds. When I started your course I weighed only 147. Now I weigh 170."
—T. K., New York

SILVER CUP GIVEN AWAY

This handsome cup, over a foot high, will be given to the pupil who makes the greatest physical improvement in the next 3 months.

MAIL COUPON TO GET MY VALUABLE BOOK FREE

CHARLES ATLAS, Dept. 3358,
115 East 23rd St., New York 10, N. Y.

Send me—absolutely FREE—a copy of your famous book, "Everlasting Health and Strength"—32 pages, crammed with photographs, answers to vital health questions, and valuable advice. I understand this book is mine to keep and sending for it does not obligate me in any way.

Name..... Age.....
(Please print or write plainly)

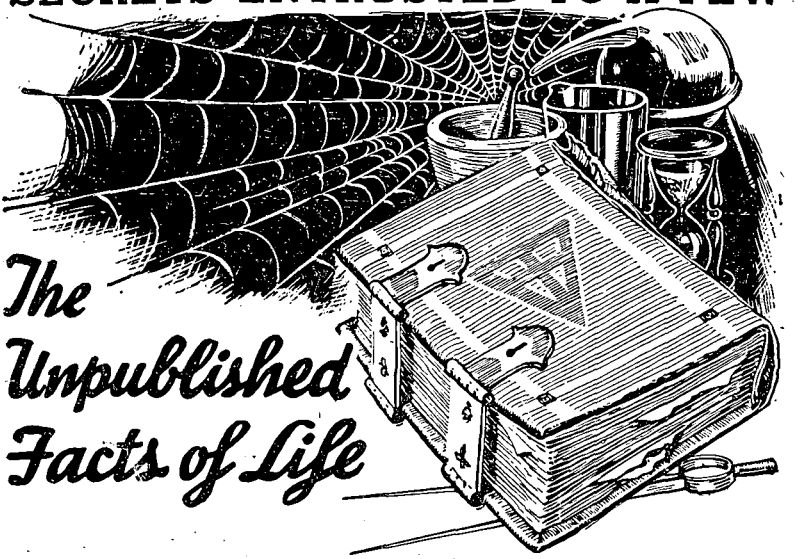
Address.....

City..... State.....

☐ If under 14 years of age check here for Booklet A.

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED

SECRETS ENTRUSTED TO A FEW



The Unpublished Facts of Life

THERE ARE some things that can not be generally told—*things you ought to know*. Great truths are dangerous to some—but factors for *personal power* and *accomplishment* in the hands of those who understand them. Behind the tales of the miracles and mysteries of the ancients, lie centuries of their secret probing into nature's laws—their amazing discoveries of *the hidden processes of man's mind*, and *the mastery of life's problems*. Once shrouded in mystery to avoid their destruction by mass fear and ignorance, these facts remain a useful heritage for the thousands of men and women who privately use them in their homes today.

THIS FREE BOOK

The Rosicrucians (not a religious organization), an age-old brotherhood of learning, have preserved this secret wisdom in their archives for centuries. *They now invite you to share the practical helpfulness of their teachings.* Write today for a free copy of the book, "The Mastery of Life." Within its pages may lie a new life of opportunity for you. Address: Scribe Y. E. V.

The ROSICRUCIANS

(AMORC) SAN JOSE • CALIFORNIA • U.S.A.

Scribe: Y. E. V. The Rosicrucians (AMORC)
San Jose, California, U. S. A.

Please send copy of sealed booklet, "The Mastery of Life," which I shall read as directed.

U 9E

Name _____

Address _____ $ 2.95

City _____

LICENSED TO UNZ.ORG
ELECTRONIC REPRODUCTION PROHIBITED